

ACTION REPORT AND MINIBOOK
STATE WATER CONTROL BOARD MEETING
MONDAY, SEPTEMBER 27, 2010,
TUESDAY, SEPTEMBER 28, 2010

House Room C
General Assembly Building
9th & Broad Streets
Richmond, Virginia

Board Members Present:

W. Shelton Miles, III, Chair
Lou Ann Jessee Wallace
Roberta A. Kellam
William A Pruitt

Robert H. Wayland, III,, Vice-Chair
Robert L. Dunn
William B. Bott

Staff Present:

David K. Paylor, Director
Department of Environmental Quality

Cindy M. Berndt
Department of Environmental Quality

Attorney General's Office:

John Butcher, Special Assistant Attorney General

The meeting was convened on June 27, 2010, at 9:30 a.m., recessed at 10:50 a.m., reconvened at 11:05 a.m., recessed at 12:00 p.m., reconvened at 1:00 p.m., closed session at 1:25 p.m., recessed at 2:45, reconvened and open session at 2:55, recessed for the day at 3:36, reconvened on June 27, 2010 at 9:30 a.m., recessed at 10:55 a.m., reconvened at 11:05 a.m., recessed at 12:20 p.m., reconvened at 1:15 p.m. and adjourned at 2:58 p.m.

ITEM

Minutes (June 21-22, 2010)

ACTION

Approved w/amended No. 10

Election of Officers

Wayland - Vice-Chair

Final Regulations

General VPDES Permit for Coin Operated Laundries
General VPA Regulation and General Permit for Poultry
Waste Management

Adopted
Adopted

Proposed Regulations

General VPDES Permit Regulation for Total Nitrogen and Total
Phosphorus Discharge and Nutrient Trading in the
Chesapeake Bay Watershed
General VPDES Permit for Pesticide Discharges

Authorized public comment

Authorized public comment

Significant Noncompliance Report

Received report

Consent Special Orders (VPA Permit Program)

George W. Kemper IV (Rockingham Co.)

Approved order

Consent Special Orders (VPDES Permit Program)

Approved orders

Blue Ridge Regional Office
Lunenburg County Administrative Complex STP
Halifax County SA Maple Avenue WWTP
Roanoke Electric Steel, dba Steel Dynamics (Roanoke)
Northern Regional Office
Arlington County WPCP
Dominion Campground, Inc. STP (Spotsylvania Co.)
Piedmont Regional Office
Town of Alberta, Alberta WWTP (Brunswick Co.)
BFI Waste Systems of Virginia LLC (Richmond)
Tidewater Regional Office
Town of Cape Charles WWTP (Northampton Co.)
KmX Chemical Corp. (Accomack Co.)
Metro Used Auto Parts, Inc. (Chesapeake)
Valley Regional Office
Town of Monterey, Monterey STP (Highland Co.)

Consent Special Orders (VWP Permit Program)Approved orders w/
amended appendix A
for Aman

Blue Ridge Regional Office
Samuel Aman (Giles Co.)
Piedmont Regional Office
Courtney Development, Inc. (Henrico Co.)

Consent Special Orders (AST, UST & Others)

Approved orders

Blue Ridge Regional Office
Mr. Mike Leech/M&M Grocery (Patrick Co.)
Piedmont Regional Office
Laburnum LLC (Henrico Co.)
Rahim Corp. (Powhatan Co.)
Southwest Regional Office
Eagle Transport of Virginia, Inc. (Bluefield)
Tidewater Regional Office
IMTT-Virginia, Chesapeake Terminal (Chesapeake)
North Carolina & Virginia Railroad Co., LLC (Chesapeake)

FY2011 Revolving Loan Fund

Authorized public comment

Division Director's Report (inc. CB WIP, drought, TMDLs)

Received report

Public Forum

John Martin appeared

305(b) Water Quality Assessment Report

Received report

Closed Meeting

pursuant to section 2.2-3711(a)(7) of the Code of Virginia for consultation with legal counsel and briefings by staff members pertaining to actual or probable litigation, and consultation with legal counsel regarding specific legal matters requiring the provision of legal advice by counsel, where such consultation or briefing in open meeting would adversely affect the negotiating or litigating posture of the public body, concerning:
Frederick-Winchester Service Authority v. State Water Control Board and Department of Environmental Quality, Case No. CL09000407-00,

Recyc Systems, Inc. v. State Water Control Bd., regarding VPA Permit No. 00054, and
Synagro Technologies, Inc. v. State Water Control Board regarding VPA Permit No. 03004.

Permits

Recyc Systems, Inc. VPA (Shenandoah Co.)

Approved permit

Petitions

Large-Scale Agricultural Operations Petition

(1) withdrew regulatory action and note that in making that we can in the future reinstate regulatory action based on-going evaluation of actions; (2) direct staff to report to the Board on the status of implementation of the MOA in Spring and Fall 2011 and thereafter, as the Board determines and (3) recommend that DEQ research the feasibility of sampling and analysis of the run-off to determine impacts to surface waters from these operations

Permits

Agri-Services Corp. VPA (Fauquier Co.)

Approved permit

Frederick-Winchester Service Authority v. State Water Control Board and Department of Environmental Quality, Case No. CL09000407-00

Based on advice of legal counsel, the Board (1) approved settlement of Case No.

CL09000407-00, Frederick-Winchester Service Authority v. State Water Control Board and Department of Environmental Quality establishing allocations for the Opequon WasteWater Treatment Facility based on 3 mg/l nitrogen and 0.3 mg/l phosphorus at 12.6 MGD which would result in an allocation of 115,122 lbs/year nitrogen with an additional 6,729 lbs/year of nitrogen for the landfill for a total of 121,851 and a total of 11,512 lbs/year of phosphorus; (2) direct the Department to public notice the approved settlement, (3) authorize the Department to review and summarize the public comments and (4) direct the Department to provide the summary, along with a copy of the comments, to both the Frederick-Winchester Service Authority and to the Court.

TMDLs

Bacterial TMDL Development for the James River and Tributaries - City of Richmond

(1) Approved the submittal of the "Bacterial Total

Maximum Daily Load Development for the James River and Tributaries – City of Richmond” to EPA by the October 1, 2010 deadline; and, (2) directed staff to proceed with the public notice requirements under §62.1-44.19:7 E for aggrieved parties wishing to conduct a Use Attainability Analysis; and, (3) directed staff to return to the Board with a summary of public comments to assist the Board in its determination of whether the requested Use Attainability Study should be allowed.

Future Meetings

Confirmed 12/9-10/2010

General Virginia Pollutant Discharge Elimination System (VPDES) Permit for Coin Operated Laundries (9VAC25-810): The staff will ask the board to adopt the regulation establishing the General VPDES Permit for Coin Operated Laundries, 9VAC25-810, as amended. It has been amended to update the general permit and reissue it for a second five-year term. The Board authorized a public hearing for this rulemaking on March 18, 2010. A public hearing was

held on May 26, 2010 and the public notice comment period closed on June 25, 2010. Other than staff, no one attended the public hearing, and no comments on the regulation amendment were received. The purpose of this proposed regulatory action is to reissue the general VPDES permit for wastewater discharges from coin operated laundries. The general permit currently in effect for these facilities expires on February 8, 2011. The permit established by the regulation is limited to a five-year term, so every five years the regulation must be amended to reissue the general permit. This opportunity is used to make any necessary changes to the regulation or permit. EPA submitted a comment and recommendation dated August 12, 2010. As a result of the EPA comment the following recommendation was incorporated into the draft general permit regulation: There is the potential for bacteria to be present in discharges from coin operated laundries and therefore the permit needs to retain the bacteria permit limit in the permit.

Request to Adopt Final Amendments to the Virginia Pollution Abatement (VPA) Regulation and General Permit for Poultry Waste Management (9VAC25-630-10 et seq.):

At the March 18 meeting, staff intends to bring to the Board a request to adopt the final amendments to the Virginia Pollution Abatement (VPA) Regulation and General Permit for Poultry Waste Management (9VAC25-630-10 et seq.). These final amendments will allow for the reissuance of the general permit under this regulation, which is due to expire on November 30, 2010. Va. Code § 62.1-44.17:1.1 authorizes the State Water Control Board to establish and implement the Poultry Waste Management Program. This Code section includes provisions that the Board must, at a minimum, include in its regulations developed pursuant to this authority, including provisions for permitting confined poultry feeding operations under a general permit. The VPA General Permit Regulation for Poultry Waste Management (9VAC25-630-10 et seq.) first became effective on December 1, 2000 with the term of the permit being ten (10) years, thus expiring on November 30, 2010. There are approximately 900 confined poultry feeding operations in the Commonwealth permitted under this regulation. The most recent amendments to the general permit regulation added requirements for end-users of poultry waste in addition to those originally included for poultry producers. The requirements regarding end-use of poultry waste became effective on January 1, 2010. A Notice of Intended Regulatory Action (NOIRA) was published in the Virginia Register of Regulations on June 22, 2009. A 30-day public comment period followed which ended on July 22, 2009. Public comments were all in favor of reissuing the general permit in 2010. The Department utilized the participatory approach by forming an ad hoc regulatory advisory panel (RAP) that held one (1) public noticed meeting on February 16, 2010. The RAP discussed a few minor amendments to the regulation, none of which produced substantive changes to the requirements. This is because more substantive changes to this regulation were recently approved in December 2009 following extensive public involvement. There was a recommendation from some RAP members that the requirement for nutrient management plans to be written by certified planners be removed since approval by DCR was also required. The proposed regulation retained this requirement because the DCR regulations specify that a "nutrient management plan" means a plan prepared by a Virginia certified nutrient management planner. This requirement is also consistent with other DEQ regulations which require that nutrient management plans be written by certified planners. The proposed regulatory language was noticed for public comment on April 12, 2010. Two public hearings were held around the state (May 13, 2010 and May 18, 2010). Upon the closing of the comment period on June 11, 2010, staff received comments from 14 individuals and organizations regarding the proposed amendments. Comments were received concerning the soil test recommendation option for land application found in the technical requirements for end-users and the requirements for certified nutrient management planners to write the plans along

with DCR approval. Based on public comments, the following changes were made to the final regulation regarding the citation of a section of the Department of Conservation and Recreation (DCR) Nutrient Management Certification regulation found in subdivision C.1.c.(3) of 9VAC25-630-80, the technical language, regarding the requirements for using the soil test recommendation option to obtain the land application rate was amended to cite a more specific subdivision of the DCR regulation. Numerous comments were received indicating that the amended language at the proposed stage would essentially eliminate the option for a soil test recommendation by citing the 4VAC5-15-150 A.2 of the DCR regulation. Staff determined that by citing 4VAC5-15-150 A.2.a. of the DCR regulation will maintain the requirement while maintaining the soil test recommendation option as intended. The final regulation retains this requirement for certified nutrient management planners to write the plans because the DCR regulations specify that a "nutrient management plan" means a plan prepared by a Virginia certified nutrient management planner. Staff has concerns, if this language is removed, it could be interpreted by the permittee that the requirement no longer exists and they no longer must comply with the requirement. Staff prefers to provide clear and concise language in the regulation regarding these requirements. This requirement is also consistent with other DEQ regulations which require that nutrient management plans be written by certified planners. Changes were also made based on a review by the staff from the Office of the Attorney General.

SUMMARY OF COMMENTS ON GENERAL VPA REGULATION AND GENERAL PERMIT FOR POULTRY WASTE MANAGEMENT

Written comments were submitted by 14 citizens and organizations: A summary of comments and agency responses are provided in the preceding pages.

SUMMARY OF COMMENTS RECEIVED & RESPONSES TO COMMENTS

GENERAL COMMENTS

GC-1 SUBJECT: SUPPORT

COMMENT: The proposed permit action embodies important protections for Virginia's waters and people. We have supported the implementation of the VPA permit to control poultry waste management and the amendments adopted in 2009, which extended coverage of the regulation to wastes transported away from the farm of origin and land-applied to other properties. We appreciate the Department of Environmental Quality (DEQ) staff's continued efforts to improve the regulation of poultry wastes and their cooperation with us and other interested parties.

COMMENTER: David W. Sligh, Upper James Riverkeeper

COMMENT: As a member of the regulatory advisory panel (RAP) who reviewed the proposed modifications to this regulation, we are generally in support of the changes contained herein. Changes to the regulation that were discussed by the RAP appear to be minimally burdensome to farmers and in general, do not cause us concern.

COMMENTER: Katie K. Frazier, Vice President - Public Affairs

COMMENT: Virginia Poultry Federation supports a 10 year renewal of the VPA General Permit Regulation for Poultry Waste Management without substantive changes.

COMMENTER: Hobey Bauhan, President - Virginia Poultry Federation

COMMENT: I think this is very good that you brought this discussion up. I only wish that I could be a writer to tell you more precisely what I think. It's really good.

COMMENTER: Elelin Geersy

COMMENT: As a Virginia Citizen, I support this proposed regulation to reinsure regulations for the disposal of poultry waste in state water systems. The disposal of the poultry waste is a state program so it is the state that needs to reiterate the regulation and keep the state waters clean. I hope that by supporting this regulation, the poultry operations will soon be covered under the general permit. By having no disadvantages and with minimum agency resources, this proposed regulation should be approved again and reissued without any lapse in time.

COMMENTER: Town Hall Commenter - "Mcintoshl"

COMMENT: Virginia Farm Bureau Federation supports reissuing the general permit program in its current form without any additional requirements being imposed on poultry growers, poultry waste brokers and poultry waste end-users.

COMMENTER: Wayne F. Pryor, President - Virginia Farm Bureau Federation

COMMENT: The Virginia Department of Conservation and Recreation (DCR) supports re-issuance of the Virginia Pollution Abatement Regulation and General Permit for Poultry Waste Management as amended in the April 12, 2010 publication of *The Virginia Register of Regulations* (Volume 26, Issue 16).

COMMENTER: Jack Frye, Director - Division of Soil and Water Conservation, Department of Conservation and Recreation

COMMENT: As a Virginia Citizen, I also support this proposed regulation to reinsure regulations for the disposal of poultry waste in state water systems. It's important we keep the state waters clean.

COMMENTER: Doug Ahearn

RESPONSE: DEQ acknowledges the support. ***No changes are being proposed to address these comments.***

GC-2 SUBJECT: INSPECTIONS PROCEDURES

COMMENT:

1. An additional recommended enforcement change is that an improved inspection scheme be incorporated into the management the VPA permit. Currently, inspections are performed annually and at a similar time each year for each individual operation. This has created an ineffectual deterrent to poor litter handling practices and sloppy litter storage, the result of which is not infrequent outdoor storage of litter by growers, at times in places where it can discharge into state waters. Naturally, we believe that a randomized approach to inspections is necessary to break the cycle of inspections, and create a year round expectation of compliance.
2. This is not to say that more than a minority of growers handle litter in any manner other than responsibly and according to the regulation. However, evidence demonstrates that there are farms that operate outside of the limitations of the permits, and enforcement strategies should be designed to maximize the

potential to eliminate these rogue operations. Randomized, and where necessary, repeated inspections of farms should be spelled out in terms of the permit and applied with avarice to eliminate all of these problems on the ground. We believe that Poultry Integrators would support this position, and we believe that the Virginia Poultry Federation would support provisions of a permit that improve the compliance rate of their members. We also believe that the majority of poultry growers who are in compliance with their permit, would prefer an inspection regime that reforms “bad actors”. Failure to address these bad actors creates an unfair competitive disadvantage to those farmers operating with sustainable, responsible practices. The continuation of predictable inspection schedules creates a financial incentive for farmers to operate irresponsibly. While it is reasonable to expect that only a minority of farmers will act on that incentive, it is inexcusable for the State to fail to close this loophole. We also believe that the majority of poultry growers would support the elimination of the types of practices which color public opinion of the industry in general.

COMMENTERS: Jeff Kelble, Shenandoah Riverkeeper

Ed Merrifield, Potomac Riverkeeper

David Burden, Virginia Eastern Shorekeeper

RESPONSE: DEQ Inspection procedures are outlined in the agency wide adopted Inspection Strategy. While a random schedule for inspecting facilities is preferred, the regional office must consider inspection resources, the locations of the facilities as well as biosecurity concerns when developing the annual regional inspections schedule.

COMMENT: CBF supports the reissuance of this general permit with amendments proposed by the Virginia Department of Environmental Quality and with modification to the program outlined below.

1. We recognize that the federal regulation of CAFOs has been undergoing changes, including the 2008 CAFO Rule, which has given clarity to the definition of point source. We encourage DEQ, to revisit their inspection program for VPA permitted facilities to ensure that potential point discharges are identified and appropriate action to protect state waters is taken. DEQ inspection staff needs to be briefed on this information so that they can identify problems during the annual inspections, including the identification of areas on the farm where point source discharges are likely to occur in wet weather, regardless of the climatic conditions at the time of the inspection.
2. We strongly recommend the institution of a random, rather than regular, schedule for enforcement visits. Currently, producers can expect an inspection around the same time of the year they were inspected the previous year. This twelve month cycle allows for long stretches where there is little risk of inspection. Randomized inspections could provide a strong disincentive for stockpiling of poultry litter and manure in a manner likely to cause a point source discharge.
3. We also recommend DEQ consider a risk-based enforcement strategy -perhaps increasing the inspection frequency on VPA permitted facilities at high risk for noncompliance, while reducing the amount of time spent on facilities that have a strong record of environmental stewardship.

COMMENTER: Kristen J. Hughes Evans, Virginia Staff Scientist -
Chesapeake Bay Foundation

RESPONSE: DEQ Inspection procedures are outlined in the agency wide adopted Inspection Strategy. While a random schedule for inspecting facilities is preferred, the

regional office must consider inspection resources, the locations of the facilities as well as biosecurity concerns when developing the annual regional inspections schedule.

In addition, DEQ has established and implemented criteria for Risk-Based inspections which include criteria for poultry and livestock operations which are covered under the animal feeding operations permit program, including any concentrated animal feeding operations. The criteria for increased and decreased inspections are outlined in this document. ***No changes are being proposed to address this comment.***

GC-3 SUBJECT: WATER QUALITY

COMMENT: That [end-user amendments] action created a scientifically based and even handed end-user regulation that will likely have immense positive impact on local streams, the Shenandoah and Potomac Rivers as well as the Chesapeake Bay. In this permit action, we commend Governor Bob McDonnell's administration for maintaining the provisions of the overall Poultry VPA permit which deal with nutrient (N&P) and Bacteria pollution.

COMMENTERS: Jeff Kelble, Shenandoah Riverkeeper
Ed Merrifield, Potomac Riverkeeper

COMMENT: The State Water Control Board, after working with a diverse group of stakeholders recently approved amendments to this same regulation adding requirements for poultry growers, brokers of poultry litter, and in particular, end-users of poultry litter. Based upon these recent amendments, and additional provisions incorporated into this proposed regulation, we believe the VPA General Permit for Poultry Waste Management is significantly protective of water quality.

COMMENTER: Katie K. Frazier, Vice President - Public Affairs

COMMENT: The board recently completed amendments to the regulation that added new requirements for poultry growers, poultry litter brokers, and end-users of poultry litter. The regulation is adequately stringent and protective of water quality, and should not at this time be changed in a manner that will increase its burden upon impacted farmers. We are agreeable to one substantive change in the proposal that creates a buffer zone with regard to the location of a litter pile. This is a reasonable provision that is already part of the nutrient management plan.

COMMENTER: Hobey Bauhan, President - Virginia Poultry Federation

COMMENT: The Virginia VPA Permit Regulation for Poultry Waste Management is an important tool for protecting water quality in the Commonwealth. Many Virginia farmers have embraced this permit program and as a result, have made significant strides in protecting water quality.

COMMENTER: Kristen J. Hughes Evans, Virginia Staff Scientist -
Chesapeake Bay Foundation

RESPONSE: DEQ acknowledges the support as the proposed amendments intend to protect and support water quality. ***No changes are being proposed to address this comment.***

GC-4 SUBJECT: ARSENIC AND OTHER CONTAMINANTS

COMMENT: We believe that the proposed regulations and General Permit make important improvements to the management and land application of poultry waste and protecting Virginia's waters from nutrient pollution. However a recent review and analysis of water quality and fish tissue data and pollution information has raised new concerns regarding the risks that other constituents contained in poultry waste may pose a threat to the environment and human health and cause or contribute to violations of State and Federal Law. We are anxious to share these data and analyses with DEQ and to have all parties fully review this information before this permitting process is completed. As always, DEQ seeks to fulfill its obligation to address known and possible pollutants that may cause or contribute to water quality and human health risks or impairments, in the permit Fact Sheet or other documents presented as part of the official record. Given the fact that a number of pollutants, other than the nutrients regulated in this permit, are present in poultry waste, including arsenic which is a known carcinogen, we believe that DEQ must incorporate available data and perform analyses to justify this permit's adequacy to regulate these substances. We believe that DEQ must incorporate such information in the permit record and make it available for public review and comment. Consequently, at this time, we reserve the right to raise additional concerns where and when these constituents cause or contribute to the violation of mandates under State and Federal law. We also reserve the right to call for additional measures in the proposed regulations and General Permit before the State Water Control Board in order to ensure "reasonable assurance" that point source discharges will not occur, that water quality standards will be upheld, and that State waters, both surface and ground water, will be protected.

COMMENTER: David W. Sligh, Upper James Riverkeeper

COMMENT:

1. Concerns with the efficacy, scope, and legality of the permit as proposed. There are serious deficiencies and problems in the proposed regulation and General Permit that cause these proposals to violate mandates, under both State and Federal law, which the State of Virginia is required to meet, and to pose substantial risks.
2. Address the long overdue issue of dangerous and environmentally poisonous contaminants found in poultry litter including but not limited to excessive phosphorous, arsenic, pesticides, other dangerous metals and high levels of estrogen and estrogen-related compounds that are being applied to Virginia soils year after year and which are reaching Virginia Rivers and the Chesapeake Bay.
3. We assert that there are serious deficiencies and problems in the proposed regulation and General Permit that cause these proposals to violate mandates, under both State and Federal law, which the State of Virginia is required to meet, and to pose substantial risks. We ask that, before it issues a renewed VPA permit, the Board direct DEQ to create a new Technical Advisory Committee to develop recommendations to solve the problems we identify.
4. The VPA permit is based upon two broad assumptions:
The first is that the requirements of the permit will ensure that discharges of pollutants to State waters will not occur from covered activities and the second is that pollutants from these activities will be applied at rates and under circumstances whereby they are agronomically useful, being taken up by crops and pastures on land-application sites.
5. The land-application of types or amounts of materials that are not useful as fertilizers constitutes a disposal of wastes rather than a beneficial use and cannot be authorized under the VPA. The provisions of the VPA requiring that nitrogen

and phosphorous be applied in accordance with a nutrient management plan or other method are intended to ensure that the assumptions listed are valid. However, there are no provisions in the VPA addressing other pollutants known or suspected to be present in poultry litter. Elements such as arsenic and selenium are proven to be present in some poultry waste and compounds such as drug residues may also occur in these wastes.

6. The permit ignores all other known or suspected pollutants in the waste and in the soils, either before or after land-application or storage on the land occurs. The State fails in its duty to provide a “reasonable assurance” that point source discharges will not occur, that water quality standards will be upheld, and that State waters, both surface and ground water, will be protected.
7. The presence of arsenic in chicken and turkey manure and the litter that contains it is of greatest concern to us at present. However, we believe that all other pollutants potentially contained in the litter must be given equal attention in the regulation and general permit.
8. Potential human health threats associated with consuming fish with arsenic in their meat and these contaminants are known fish toxins and estrogens (which interfere with reproduction in fish and shellfish) and many populations of which are in decline. We conclude that it is completely inappropriate for these contaminants to be permitted in poultry litter, it is unjustifiable for these contaminants to be applied to our land and that this permit process should not be allowing these contaminants to be accumulating in the fish in our public waters.
9. We also submit that most landowners who receive litter for fertilizer and many growers themselves have not been made aware of these contaminants and may be applying litter and are thereby unknowingly and unwillingly creating pollution issues on their property and health risks to themselves, their families and their neighbors. That makes this a property rights issue in addition to a public health and environmental issue. This VPA permit authorizes the application of poultry waste with complete disregard for the threats of these hazardous contaminants within the waste, and for the health and wellbeing of the landowners who are unable to manage their land and application operations safely due to the lack of information they are given.
10. This regulation and its related permit are designed to eliminate discharges of pollutants to state waters. It does this by limiting the use of poultry waste as a fertilizer to agronomic rates of application. This is good policy. However there are large amounts of non-agronomic contaminants in poultry waste and bedding and these contaminants serve no agricultural or agronomic benefit. We believe that the application of these contaminants constitutes an illegal dumping which are not covered by either this regulation, the VPA permit or by the Clean Water Act, FIFRA, RCRA, EPCRA and CERCLA environmental laws.
11. We find no evidence in the record to show the benefit of arsenic as a soil amendment, and no record to show that plants use arsenic agronomically. Therefore, the disposal of these contaminants constitutes solid waste disposal at the very minimum, and under certain circumstances may constitute hazardous waste disposal.
12. We believe this puts Virginia in the position of regulating these contaminants out of litter entirely and applying a moratorium on the application of litter containing these contaminants, or that enforcement action be taken to remove the contaminants from litter and hold integrators accountable for the introduction of these contaminants into poultry feed, litter and the waste stream.

COMMENTERS: Jeff Kelble, Shenandoah Riverkeeper

Ed Merrifield, Potomac Riverkeeper

David Burden, Virginia Eastern Shorekeeper

RESPONSE: Arsenic is commonly found in soil and water environments due to natural geological processes as well as human activity. While research is ongoing, there is not an abundance of evidence to indicate that poultry litter applications made using appropriate BMPs (as included in the proposed regulation) will raise arsenic concentrations in soil sufficiently over background levels to pose water quality problems. Further, the efforts of the Virginia Fish Kill Task Force focused specifically on arsenic as a possible cause of recent fish kills in the Shenandoah Valley, an area with a high frequency of poultry litter applications. No definitive evidence linking arsenic (or poultry litter) to the fish kills could be found. Research has shown that misapplied poultry litter can result in water quality problems, primarily related to nutrients and pathogens, thus those are the focus of the regulatory requirements. Further, many poultry companies have ceased using arsenical compounds in the feed. The storage requirements included in the proposed regulation will protect surface and ground water from leaching and runoff.

Multiple restrictions included in the proposed regulation serve to protect state waters from nutrient and pathogen impairments. These restrictions include application rates, application timing, land application buffers, storage location, storage surface and storage covers.

Wastes (such as poultry litter) generated by the growing and harvesting of agricultural crops or the raising of animals, are not considered hazardous waste in Virginia Waste Regulations provided it is returned to soil as fertilizer. Studies by scientists with the Agricultural Research Service have found that management practices such as proper litter storage and litter spill management outside of storage facilities can control migration of arsenic and other agricultural pollutants. ***No changes are being proposed to address this comment.***

COMMENT: We call on Virginia to begin transitioning from the use of the P-Index in dictating phosphorus application rates from animal manure, to more protective crop removal and soil test P methods which are designed to stabilize and reduce soil phosphorus saturation, and reduce phosphorus runoff.

COMMENTERS: Jeff Kelble, Shenandoah Riverkeeper
Ed Merrifield, Potomac Riverkeeper

RESPONSE: The Department of Conservation and Recreation has the authority to make changes to the Nutrient Management Regulation and requirements. The requirements related to the use of the P-Index are not within the scope of § [62.1-44.17:1.1](#) of the Code of Virginia. ***No changes are being proposed to address this comment.***

COMMENT: The estrogenic and androgenic compounds in litter must be accounted for in the VPA permit.

RESPONSE: DEQ is aware that the Environmental Protection Agency (EPA) is studying the effects of endocrine disruptors. If EPA establishes criteria, the department will adopt the criteria once established. ***No changes are being proposed to address this comment.***

COMMENT: Has Virginia examined the pesticides used in poultry bedding material and applied to land? We find no evidence of it in the permit fact sheet.

COMMENTERS: Jeff Kelble, Shenandoah Riverkeeper
Ed Merrifield, Potomac Riverkeeper

RESPONSE: Federal pesticide laws and regulations govern the use of these products based on where they are used. The impact of pesticide residuals is controlled by use according to the instructions on the mandatory label. ***No changes are being proposed to address this comment.***

GC-5 SUBJECT: MISCELLANEOUS COMMENTS

COMMENT: We recommend that the Board consider including language in the VPA General Permit for Animal Feeding Operations that specifically prohibits cattle access to streams in confinement areas, as well as other scenarios that could lead to a point source discharge (for example uncovered manure piles stored near streams).

COMMENTER: Kristen J. Hughes Evans, Virginia Staff Scientist -
Chesapeake Bay Foundation

RESPONSE: Amendments to the VPA General Permit for Animal Feeding Operations is not within the scope of § [62.1-44.17:1.1](#) of the Code of Virginia or this regulatory action. Comments are unrelated to this regulatory action or these proposed amendments. ***No changes are being proposed to address this comment.***

COMMENT: As a farmer, broker and applicator, I would ask that you keep the requirements as least restrictive as possible on the farmers, growers and end-users.

COMMENTER: Reid Mackey - Farmer, Poultry Waste Broker and Applicator

RESPONSE: DEQ acknowledges your concern and is not proposing to amend the existing language to add more restrictions during this regulatory action. The amendments that are being proposed are to clarify the existing language and allow for the general permit to be reissued. ***No changes are being proposed to address this comment.***

SPECIFIC SECTION COMMENTS

SC-1 SUBJECT: TECHNICAL REQUIREMENTS - SECTION 80

COMMENT: We generally support the proposed regulation, but would draw your attention to one provision in the proposal that we feel may be a substantive change that would go against the principle of not adding new burdens. This provision is at 9VAC25-630-80 (Utilization and storage requirements for transferred poultry waste), in C. (Land Application Requirements) at subsection 1. Establishing options for land application rates; at (c.) setting forth requirements when the application rates are set via soil test recommendations. The existing language at (c.) 3 requires that land application rates be in accordance with the soil test recommendation. The agency proposes to strike the reference to soil test recommendation and insert that land application rates be in accordance with 4VAC5-15-150 A2. This refers to the DCR nutrient management regulations' provisions for nutrient application. The DCR regulatory section is broad and prescriptive. The intent of the Regulatory Advisory Committee and the agency draft prior to review by the Attorney General's office was to provide a range of options. One of these options was a soils test. Another option was an NMP in accordance with the DCR regulations. Our concern is that the proposed language is taking away the simple soil

test option. At worst it creates a de facto requirement for a NMP and at the very least refers to prescriptive NMP regulations that are a whole lot broader than determining application rates based on a soil test. We respectfully ask that the language be kept in its existing form, and that the agency not go forward with the proposed change.

COMMENTER: Hobey Bauhan, President - Virginia Poultry Federation

COMMENT: The Farm Bureau Federation has concern regarding the changes to the soil test option language in 9VAC25-630-80 and asks that the agency not change the language.

COMMENTER: Tony Banks, Assistant Director, Commodity/Marketing Department - Virginia Farm Bureau Federation

COMMENT: We oppose any proposal to limit, directly or indirectly, the number of alternative methods end-users may use to determine poultry waste land application rates. It is our understanding at the conclusion of the Regulatory Advisory Panel meeting, that no substantive amendments were being considered then, only amendments intended to clarify for consistency and to remove outdated and unnecessary references. We are concerned that the proposed amendments to 9VAC25-630-80C. Land application requirements. are, if not a proposal to make a substantive amendment, likely to create confusion among poultry waste end-users and could in fact result in poultry waste being stranded in areas of concentration in response to decreased end-user demand or poultry waste. The current regulation provides four optional methods, including nutrient management plan, for end-users to use in determining their land application rates of poultry waste. There is much concern that the proposed specific references to certain subsections within 4VAC5-15-150A.2. could imply or be interpreted as to require nutrient management plan implementation by the end-user in 9VAC25-630-80C.1.c. and thus limit the end-user to only two methods in determining their land application rates of poultry waste. If proposed amendments to 9VAC25-630-80 C are intended to clarify the rule, we recommend the following:

1. In 9VAC25-630-80 C.1.c.3. after "accordance with 4VAC5-15-150A.2." insert "however, this application rate method does not require a nutrient management plan."
2. When discussing nutrient application rates replace references to "in accordance with §10.1-104.2 of the Code of Virginia" to "in accordance with 4VAC5-15-150A.2." at 9VAC25-630-50 Part I.8, 9VAC25-630-50 Part I.9, at 9VAC25-630-50 Part III.12, 9VAC25-630-50 Part III.13, and 9VAC25-630-80 C.1.a.(2).

COMMENTER: Wayne F. Pryor, President - Virginia Farm Bureau Federation

RESPONSE: After the review of the language by staff of the Office of the Attorney General (OAG), DEQ added the following citation of 4VAC5-15-150A.2 to this subdivision to clarify the requirements regarding nutrient recommendations. DEQ staff has determined that by citing the more specific subdivision A.2.a. of 4VAC5-15-150 of the DCR regulation will address the concern related to this requirement while also maintaining the soil test recommendation option as originally intended and drafted. ***The citation 4VAC5-15-150A.2. found in subdivision C.1.c.(3) will be replaced with 4VAC5-15-150A.2.a. in the final amendments. The citation 10.1-104.2 of the Code of Virginia will be replaced with 4VAC5-15-150A.2. in the final amendments for the following subdivisions: Part I.B.8 of 9VAC25-630-50, Part I.B.9 of 9VAC25-630-50 at Part III.B.12 of 9VAC25-630-50, Part III.B.13 of 9VAC25-630-50, and C.1.a.(2) of 9VAC25-630-80.***

COMMENT: DCR also strongly advises the current language be retained concerning nutrient recommendations in 9VAC25-630-80C.1.c.(3)

COMMENTER: Jack Frye, Director - Division of Soil and Water Conservation, Department of Conservation and Recreation

RESPONSE: DEQ staff has determined that by citing the more specific subdivision A.2.a. of 4VAC5-15-150 of the DCR regulation will address the concern related to this requirement while also maintaining the soil test recommendation option as originally intended and drafted. ***The citation 4VAC5-15-150A.2. found in subdivision C.1.c.(3) will be replaced with 4VAC5-15-150A.2.a. in the final amendments.***

COMMENT: DCR also strongly advises the current language be retained concerning soil analysis results and timing of application in sections 9VAC25-6[3]0-80C.1.c.(2) and 9VAC25-6[3]0-80C.2.

COMMENTER: Jack Frye, Director - Division of Soil and Water Conservation, Department of Conservation and Recreation

RESPONSE: DEQ acknowledges the support as the proposed amendments. ***No changes are being proposed to address this comment.***

COMMENT: There is one provision that has been changed after the RAP concluded its discussion which we believe to be substantive and raises concerns for us.

1. c. Soil test recommendations can be used when:

(3)Nutrients from the waste application do not exceed the nitrogen or phosphorus recommendations for the proposed crop or double crops ~~listed on the soil test recommendation~~ in accordance with 4VAC5-15-150A.2.

Subsection c. of 9VAC25-630-80 (Utilization and Storage Requirement for Transferred Poultry Waste) provides end-users of poultry litter with four different options for determining the application rates utilized in applying litter. The suggested amendment to section c.(3) (soil test method), would now require that nutrient applications do not exceed recommendations in 4VAC5-15-150A.2. This section of DCR's Nutrient Management Regulations refers to the establishment of nutrient application rates within a nutrient management plan. This regulatory section is very broad and prescriptive. The intent of the original draft language was to provide end-users of poultry litter with an option of utilizing the results of a soil test if appropriate. By referring back to DCR's nutrient management plan requirements, this essentially removes the option of utilizing soil test results and leaves only three options for end-users to determine their application rates. In addition, it creates greater uncertainty for end-users of poultry litter as to exactly how to determine their application rates when utilizing the "soil test method". If there is a concern about the soil test laboratories utilized by farmers not meeting the procedural and application rate recommendation standards set by DCR, this should be addressed in subsection c.2. by requiring that laboratories issue recommendations that meet DCR specifications. In order to maintain the previously approved regulatory program for end-users of poultry litter, which was reached after many months of negotiating between the environmental and agricultural communities, we respectfully ask that the language in subsection c.(3) be kept in its existing form, and that the Board not approve this proposed change.

COMMENTER: Katie K. Frazier, Vice President - Public Affairs

RESPONSE: After the review of the language by staff of the Office of the Attorney General (OAG), DEQ added the following citation of 4VAC5-15-150A.2 to this

subdivision to clarify the requirements regarding nutrient recommendations. DEQ staff has determined that by citing the more specific subdivision A.2.a. of 4VAC5-15-150 of the DCR regulation will address the concern related to this requirement while also maintaining the soil test recommendation option as originally intended and drafted.

4VAC5-15-150A.2. will be replaced with 4VAC5-15-150 A.2.a. in the final amendments.

SC-2 SUBJECT: CERTIFIED NUTRIENT MANAGEMENT PLANNER AND DCR APPROVAL

COMMENT: The Department is strongly in favor of retaining the language pertaining to the writing of nutrient management plans for permitted poultry operations by certified nutrient management planners and the approval of such plans by DCR.

COMMENTER: Jack Frye, Director - Division of Soil and Water Conservation, Department of Conservation and Recreation

RESPONSE: DEQ is not proposing to amend the existing language to remove this requirement. ***No changes are being proposed to address this comment.***

COMMENT: During the Regulatory Advisory Panel proceedings and here, we propose eliminating all requirements with 9VAC25-630 et. seq. that stipulate a nutrient management plan be developed by a "certified nutrient management planner" and replacing the reference with "[a plan] developed or approved by the Department of Conservation and Recreation". We believe requiring the plan be developed by a "certified nutrient management planner" is an outdated requirement in this instance and one that will inhibit implementation of cost-effective alternative planning methods. The following reasons support our position:

1. The legislative authority for this regulatory program does not require a nutrient management plan be developed by a "certified nutrient management planner". §62.1-44.17:1.1 A defines nutrient management plan as "a plan developed or approved by the Department of Conservation and Recreation that requires proper storage, treatment and management of poultry waste, including dry litter, and limits accumulation of excess of nutrients in soils and leaching or discharge of nutrients into state waters."
2. The "certified nutrient management planner" requirement is based on a policy decision 1) to address the anticipated workload increase for state nutrient management planning personnel by automatically recognizing plans developed by other public sector and private sector planners certified by the Department of Conservation and Recreation (DCR), 2) to recognize the limited number of qualified nutrient management planners operating in Virginia, and 3) to encourage additional public and private sector individuals to seek DCR certification as a nutrient management planner.
3. It is our understanding that DCR reviews each nutrient management plan developed for compliance with this and other VPA permit programs for approval even though the plan is written by a certified planner. This seems duplicative since DCR's nutrient management certification program stipulates how a certified planner must develop a plan as well as the plan's minimum content which is equivalent to the VPA requirements here. As long as the recommendations and content of a nutrient management plan comply with all other VPA statutory and regulatory requirements and DCR reviews the submitted plan for approval, any person capable of developing a nutrient management should be allowed to do so.

4. We anticipate the demand for nutrient management plans will increase in response to the broker and end-user requirements approved in 2009, anticipated ratcheting of federal requirements on all confined animal feeding operations, and anticipated state and federal requirements aimed at benefiting the Chesapeake Bay. Permitted poultry growers already have to wait weeks or sometimes months for nutrient management plan revisions for changes as simple as adding a field or switching a crop within the rotation on one field. Nutrient management planning software may be available now that was not available when this policy decision was made over ten years ago to require "certified" planners. The state budget shortfall recently resulted in the reduction of the DCR's capacity to provide nutrient management planning assistance. The level of participation in DCR nutrient management certification program appears stagnant and may not generate enough additional "certified" planners to meet technical assistance needs over the next 10 years.

COMMENTER: Wayne F. Pryor, President - Virginia Farm Bureau Federation

RESPONSE: The proposed regulation retained this requirement because the DCR regulations specify that a "nutrient management plan" means a plan prepared by a Virginia certified nutrient management planner. DEQ has concerns, if this language is removed, it could be interpreted by the permittee that the requirement no longer exists and they no longer must comply with the requirement. DEQ prefers to provide clear and concise language in the regulation regarding these requirements. This requirement is also consistent with other DEQ regulations which require that nutrient management plans be written by certified planners. DEQ is not proposing to amend the existing language to remove this requirement. ***No changes are being proposed to address this comment.***

SC-3 SUBJECT: NITROGEN AND PHOPHORUS APPLICATION RATES LANGUAGE

COMMENT: DCR also strongly advises the current language be retained concerning nitrogen and phosphorus application rates in sections 9VAC25-630-50.[Part]I.B.8-9, 9VAC25-630-50 [Part] III.B.12-13

COMMENTER: Jack Frye, Director - Division of Soil and Water Conservation, Department of Conservation and Recreation

RESPONSE: After the review of the language by staff of the Office of the Attorney General (OAG), DEQ added the following citation of 4VAC5-15-150A.2 to these subdivisions to clarify where the requirements can be found regarding nutrient application rates. ***The citation 10.1-104.2 of the Code of Virginia will be replaced with 4VAC5-15-150A.2. in the final amendments for the following subdivisions: Part I.B.8 of 9VAC25-630-50, Part I.B.9 of 9VAC25-630-50 at Part III.B.12 of 9VAC25-630-50, Part III.B.13 of 9VAC25-630-50, and C.1.a.(2) of 9VAC25-630-80.***

SC-4 SUBJECT: FACT SHEET

COMMENT: We assert that DEQ's Fact sheet and supporting materials for this permit must include analysis of the potential effects of toxic substances and amendments to poultry waste before it is applied to our land. Then DEQ needs to ensure that all water quality standards are met as prescribed in the permit.

**COMMENTERS: Jeff Kelble, Shenandoah Riverkeeper
Ed Merrifield, Potomac Riverkeeper**

RESPONSE: The purpose of the DEQ Fact Sheet is to summarize, for poultry litter end-users, the requirements set forth in Chapter 9VAC25-630. The agency believes that the general permit and the regulation including technical requirements contained in section 9VAC25-630-80 will adequately address concerns regarding appropriate storage and agronomic land application of poultry waste. Compliance with these conditions will ensure water quality standards will be met. ***No changes are being proposed to address this comment.***

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
9VAC25-630 (Chapter Title)	Amended Title of Chapter	Amended to read: VIRGINIA POLLUTION ABATEMENT REGULATION AND GENERAL PERMIT FOR POULTRY WASTE MANAGEMENT	Amended Title to clarify that this Chapter includes both the general permit and technical requirements outside of the general permit.	None	Not Applicable
9VAC25-630-10. (Definitions)	Amended definition	None	Not Applicable	Amended agricultural storm water definition to read: "Agricultural storm water discharge " means a precipitation-related discharge of manure, litter, or process wastewater which has been applied on land areas under the control of an animal feeding operation or under the control of a poultry waste end-user or poultry waste broker in accordance with a nutrient management plan approved by the Virginia Department of Conservation and Recreation and in accordance with site-specific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure, litter or process wastewater.	Clarify the definition
	Amended definition	None	Not Applicable	Amended confined poultry feeding operation definition to read: "Confined poultry feeding operation" means any confined animal feeding operation with 200 or more animal units of poultry. This equates to 20,000 chickens or 11,000 turkeys regardless of animal age or sex.	Clarify the definition
	Amended definition	None	Not Applicable	Amended fact sheet definition to read: "Fact sheet" means the document prepared by the department that	Clarify the definition

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
				summarizes the requirements set forth in this chapter regarding utilization, storage, and management of poultry waste by poultry waste end-users and poultry waste brokers.	
9VAC25-630-10. (Definitions)	Added definition	None	Not Applicable	"General permit" means section 50 of this regulation, 9VAC25-630-50.	Clarify the meaning of the text in the regulation
	Amended definition	Amended nutrient management plan definition to read: "Nutrient management plan" or "NMP" means a plan developed or approved by the Department of Conservation and Recreation that requires proper storage, treatment and management of poultry waste, including dry litter, and limits accumulation of excess nutrients in soils and leaching or discharge of nutrients into state waters; <u>except that for a poultry waste end-user or poultry waste broker who is not subject to the general permit the requirements of 9VAC25-630-80 constitute the NMP.</u>	Added language to clarify the ability to use section 9VAC25-630-80 as a nutrient management plan so as to comply with § 62.1-44.17:1.1 which states the regulatory program must ensure proper storage of waste consistent with the terms and provisions of a nutrient management plan. The waste storage provisions contained in section 80 of 9VAC25-630 are consistent with the terms and provisions of a nutrient management plan.	Added a comma after general permit.	Corrected grammatical error
	Amended definition	Amended poultry waste broker definition: Removed "their" and replaced with "his"	Replaced pronoun for clarity	None	Not Applicable
9VAC25-630-20. (Purpose, delegation of	Amended subsection A.	Removed "general permit" from subsection A	Removed language since this is not just a general permit regulation.	None	Not Applicable

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
authority)		Removed "Pollution", replaced with " <u>Pollutant</u> "	Substituted correct term	None	Not Applicable
	Amended subsection C.	Amended effective date of the permit	Amended date for reissuance	None	Not Applicable
9VAC25-630-25. (Duty to comply)	Added new section	Added new section which includes language regarding the duty to comply with the regulation and general permit by the poultry grower, poultry waste broker and poultry waste end-user.	Added new section to clarify the duty to comply with the regulation and general permit	None	Not Applicable
9VAC25-630-30. (Authorization to manage pollutants)	Amended subsection A.	Removed "provided that"	Language was redundant in subsection	None	Not Applicable
	Amended subsection A.1.	Removed "Pollution", replaced with " <u>Pollutant</u> "	Substituted correct term	None	Not Applicable
	Amended subsection A.3.	Removed "considered"	Clarify the prohibition	None	Not Applicable
	Amended subdivision A.4.	Amended language regarding requirement to obtain NMP.	Amended to clarify that the poultry grower is to obtain the approval of the NMP from the Department of Conservation and Recreation	None	Not Applicable
		Amended to remove language regarding an obsolete date	Date is obsolete and no longer necessary	None	Not Applicable

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
	Amended subdivision A.5.	Added language to clarify the timing of the adjoining property notification " <u>Prior to filing</u> " Removed "When a poultry grower files"	Amended to clarify when the adjoining property notification must be completed	None	Not Applicable
	Amended subdivision A.6.	Added " <u>permitted</u> " to clarify that the permitted grower is required to complete a training program	Clarifies who is required to complete the training program	None	Not Applicable
9VAC25-630-30. (Authorization to manage pollutants)	Amended subsection B.	Removed language: "who receives transferred poultry waste" and "regarding utilization, storage, and tracking, and accounting of poultry waste in his possession or under his control"	Removed redundant language - the language is in the poultry waste end-user and broker definitions	None	Not Applicable
	Amended subsection B.	Added " <u>or the general permit as applicable</u> "	Added for further clarification of requirements	None	Not Applicable
	Amended subsection B.2.	Removed "provided that"	Language was redundant in subsection	None	Not Applicable
	Amended subdivision B.2.c.	Amended language regarding requirement to obtain NMP.	Amended to clarify that the poultry grower is to obtain the approval of the NMP from the Department of Conservation and Recreation	None	Not Applicable
		Amended to remove language regarding an obsolete date	Date is obsolete and no longer necessary	None	Not Applicable

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
	Amended subdivision B.2.d.	None	Not Applicable	Added poultry waste to end-users and brokers.	Added language to make this subdivision consistent with language throughout the regulation
	Added subsection D. Continuation of permit coverage	None	Not Applicable	Added language regarding continuation of permit coverage with conditions	Added language to allow for consistency with other general permit regulations
9VAC25-630-40 (Registration statement)	Amended subsection A.	None	Not Applicable	Added the following items to the contents of the registration statement: e-mail addresses (if available), Farm Name (if applicable), whether the poultry are grown under a contract and the name of the poultry integrator (if applicable)	Added to enable more efficient communication & improve the agencies database of information regarding the facility

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
	Amended subsection A.	None	Not Applicable	Amended the neighbor notification portion of the certification statement to read: "I certify that [notice of the registration statement] for any confined poultry feeding operation that proposes construction of [<u>new</u>] poultry growing houses [after December 1, 2000, notice of the registration statement] has been given to all owners or residents of property that adjoins the property on which the confined poultry feeding operation will be located. This notice included the types and numbers of poultry which will be grown at the facility and the address and phone number of the appropriate Department of Environmental Quality regional office to which comments relevant to the permit may be submitted.	Clarified the language regarding adjacent neighbor notification and removed obsolete date
	Amended subsection B.	None	Not Applicable	Added the e-mail addresses (if available) to the contents of the registration statement.	Added to enable more efficient communication with the permittee
9VAC25-630-50 (Contents of the general permit)	Amended General Permit Dates	Revised effective and expiration dates Removed modification dates	Amended dates for reissuance	None	Not Applicable
	Amended first paragraph	None	Not Applicable	Removed "or policies"	Removed unnecessary language
	Amended Part I.A. soils monitoring table	None	Not Applicable	Added footnote regarding sampling requirements	Added to clarify where to find the specific requirements
9VAC25-630-50 (Contents	Amended Part I.B.2.	Added language to clarify adequate storage " <u>or at a site</u> "	Clarify the language	None	Not Applicable

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
of the general permit)		Added language: <u>d. For poultry waste that is not stored under roof, the storage site must be at least 100 feet from any surface water, intermittent drainage, wells, sinkholes, rock outcrops, and springs.</u>	Added requirement to permit language for consistency of the storage requirements found in section 80 of 9VAC25-630. This is not a new requirement since the requirement is already in the special conditions of the permitted grower's nutrient management plan.		
	Amended Part I.B.5	Removed "considered"	Clarify the prohibition	None	Not Applicable
	Amended Part I.B.6.	Amended and removed language regarding an obsolete date	Date is obsolete and no longer necessary	Added "terms of the" to the last sentence	Clarify the language
	Amended Part I.B.8.	Amended language regarding the nutrient management plan requirements.	Clarify the language	Replaced §10.1-104.2 Code of Virginia citation with the Department of Conservation and Recreation regulation citation (4VAC5-15-150 A2)	Clarify the specific requirements that must be followed
	Amended Part I.B.9.	Amended language regarding the nutrient management plan requirements including removing obsolete dates.	Clarify the language	Replaced §10.1-104.2 Code of Virginia citation with the Department of Conservation and Recreation regulation citation (4VAC5-15-150 A2)	Clarify the specific requirements that must be followed
	Amended Part I.B.10.	None	Not Applicable	Added "covered" after ice	Added language to make this subdivision consistent with similar language throughout the

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
					regulation
9VAC25-630-50 (Contents of the general permit)	Amended Part I.B.11.	Added " <u>Poultry waste shall not be land applied within buffer zones</u> " to clarify restriction	Clarify the prohibition	None	Not Applicable
	Amended Part I.B.13.	None	Not Applicable	Added "permitted" to the last sentence	Clarify who must comply with the requirement
	Amended Part II.C.	None	Not Applicable	Added sentence to subsection: If reporting is required by Part I or Part III of this general permit, the permittee shall follow the requirements of this subsection.	Added sentence to clarify the requirements for reporting monitoring results
	Amended Part II.D.	None	Not Applicable	Replaced board with Director	Substituted correct term
	Amended Part II.L.	None	Not Applicable	Amended language: added general permit and regulation citation	Clarify the duty to comply with the permit and regulation
	Amended Part II.M.	None	Not Applicable	Amended timeframe to reapply for the permit: reduced from 180 days to 30 days	This timeframe allows for completion of the reissuance of the regulation
	Amended Part II.Y.	None	Not Applicable	Amended language regarding transfer of permits	Clarify the requirements of transferring the permit

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
	Amended Part III.A. soils monitoring table	None	Not Applicable	Added footnote regarding sampling requirements	Added to clarify where to find the specific requirements
9VAC25-630-50 (Contents of the general permit)	Amended Part III.B.2.	Added language to clarify adequate storage " <u>or at a site</u> " Added language: d. <u>For poultry waste that is not stored under roof, the storage site must be at least 100 feet from any surface water, intermittent drainage, wells, sinkholes, rock outcrops, and springs.</u>	Clarify the language Added requirement to permit language for consistency of the storage requirements found in section 80 of 9VAC25-630.	None	Not Applicable
	Amended Part III.B.9.	Removed "considered"	Clarify the prohibition	None	Not Applicable
	Amended Part III.B.10.	Amended and removed language regarding an obsolete date	Date is obsolete and no longer necessary	Added "terms of the" to the last sentence	Clarify the language
	Amended Part III.B.12.	Amended language regarding the nutrient management plan requirements.	Clarify the language	Replaced §10.1-104.2 Code of Virginia citation with the Department of Conservation and Recreation regulation citation (4VAC5-15-150 A2)	Clarify the specific requirements that must be followed
	Amended Part III.B.13.	Amended language regarding the nutrient management plan requirements including removing obsolete dates.	Clarify the language	Replaced §10.1-104.2 Code of Virginia citation with the Department of Conservation and Recreation regulation citation (4VAC5-15-150 A2)	Clarify the specific requirements that must be followed
	Amended Part III.B.14.	None	Not Applicable	Added "covered" after ice, removed hyphenation	Added language to make this subdivision

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
					consistent with similar language throughout the regulation
	Amended Part III.B.15.	Added " <u>Poultry waste shall not be land applied within buffer zones</u> " to clarify restriction	Clarify the prohibition		
9VAC25-630-50 (Contents of the general permit)	Amended Part III.B.17.	None	Not Applicable	Added "permitted" to the last sentence	Clarify who must comply with the requirement
9VAC25-630-80 (Utilization and storage requirements for transferred poultry waste)	Amended subsection C.1.(c)(2) and C.1.(c)(3)	Amended language to clarify the specific subdivision of the regulation promulgated by the Department of Conservation and Recreation	Clarify the language	Amended citation in C.1.(c)(3): replaced 4VAC5-15-150A.2. with 4VAC5-15-150A.2.a.	Amended to further clarify the subdivision where to find the requirements regarding nutrient recommendations.
9VAC25-630-80 (Utilization and storage requirements for transferred poultry waste)	Amended subsection C.2.	Amended language to clarify the specific subdivision of the regulation promulgated by the Department of Conservation and Recreation	Clarify the language	Added "covered" after ice, removed hyphenation	Added language to make this subdivision consistent with similar language throughout the regulation
	Amended subsection C.3.	Added " <u>Poultry waste shall not be land applied within buffer zones</u> " to clarify restriction	Clarify the prohibition	None	Not Applicable
	Amended subsection	Removed "or", replaced with " <u>and</u> "	Corrected typographical error	None	Not Applicable

Regulation Section	Action	Changes at Proposed Stage	Rationale	Changes since Proposed Stage	Rationale for Change
	D.				
FORMS (9VAC25-630)	Amended section to add the revised forms	None	Not Applicable	<p>Amended: <i>Registration Statement, VPA General Permit for Poultry Waste Management for Poultry Growers, RS VPG2 (rev. 07/10)</i></p> <p>Amended: <i>Registration Statement, VPA General Permit for Poultry Waste Management for Poultry Waste End-Users and Brokers, RS VPG2 (rev. 07/10)</i></p> <p>Amended and Added Poultry Litter "Fact Sheet": <i>Fact Sheet, Poultry Litter, Requirements for Poultry Litter Use and Storage, VA DEQ (rev. 12/10)</i></p>	<p>Amended the registration statements to reflect the changes made in 9VAC25-630-40</p> <p>Amended the revised Fact Sheet to reflect the changes made in 9VAC25-630-80 and added the revised Fact Sheet to this section of the regulation</p>

Reissuance of the General VPDES Watershed Permit Regulation for Total Nitrogen and Total Phosphorus Discharge and Nutrient Trading in the Chesapeake Bay Watershed in Virginia (9 VAC 25-820): The current general permit that governs facilities holding individual VPDES permits that discharge or propose to discharge total nitrogen or total phosphorus to the Chesapeake Bay or its tributaries will expire on December 31, 2011, and the regulation establishing this general permit is being amended to reissue another five-year permit. The staff intends to bring this proposed regulation amendment before the Board at their September 27-28, 2010 meeting to request authorization to hold public hearings. A Notice of Intended Regulatory Action (NOIRA) for the amendment was published in the *Virginia Register* on September 14, 2009 and the comment period closed on October 14, 2009. The following comments were received:

Michael Smith, Asst. Dir. Operations Stafford County Utilities, is concerned about the quantification level (QL) used in the calculations for daily concentrations and thereby total loadings. Amy Ewing, Virginia Dept. of Game and Inland Fisheries, would like for DEQ to look into alternatives to the use of chlorine for pre-treatment of waste water discharged by small treatment systems covered by this general permit regulation.

James J. Pletl, PhD; Chief, Technical Services Div. of HRSD; raised concerns about differences in reporting procedures and redundancy in reporting, unnecessary analytical requirements, and possibly unintended wastewater sampling restrictions. HRSD would like to provide assistance in developing the general permit regulation by serving on the TAC.

Jean Andrews; Regulatory Compliance Coordinator, Augusta County Service Authority; requested the changes to the 9VAC25-820.

Meghan F. Morel; Client & Government Relations Coordinator, AquaLaw PLC; forward a letter from the Virginia Nutrient Credit Exchange Association requesting that representatives be placed on the technical advisory group (TAG). The representatives are Christopher D. Pomeroy, Esq., AquaLaw LC and Glenn Harvey of the Prince William County Service Authority.

Glenn B. Harvey; Process Engineer, Prince William County Service Authority; is requesting to serve on the technical advisory group (TAG).

Andrew D. Mueller; U.S. Fish and Wildlife Service; gave general statements about regulating nutrient flow to increase oxygen in the water and thus controlling algae blooms.

The staff has reviewed the current permit and the draft regulation takes into consideration the recommendations of a technical advisory committee formed for this regulatory action. Changes to the current regulation include:

1. Deletion of sections dealing with initial compliance plans and a schedule of compliance. Nutrient limits are scheduled to go into effect as of 1/1/11 and these sections are no longer necessary. Sections are held as “reserved” to maintain the section references included in previously executed Virginia Nutrient Credit Exchange Association contracts
2. Miscellaneous changes meant to correct inaccuracies introduced by previous requirements to calculate loads based on flows expressed to the nearest 0.01 MGD and to round nutrient loads to the nearest whole pound on a daily basis. These two procedures introduced errors into calculations provided by smaller facilities.
3. A change to the definition of “expansion” to recognize that production changes or the use of treatment additives at industrial facilities could result in increased nutrient loads to be addressed under the watershed general permit.

4. Inclusion of a new definition of “local water quality based limitations”; a term used in the existing permit.
5. A new definition of “quantification level” to match that used by the Division of Consolidated Laboratory Services.
6. Provisions to implement a number of bills addressing nutrient trading that have become effective since the original regulation was adopted. These provisions include:
 - a. Allowance for VPA treatment systems in existence as of 7/1/2005 that need to replace their system with a discharging system to petition the Board for a wasteload allocation for coverage under the watershed general permit.
 - b. A requirement that new municipal treatment systems with a design flow between 1,000 and 40,000 gpd that are not discharging as of 1/1/2011 must offset all nutrient loads and register for coverage.
 - c. Allowance for permitted facilities on the Eastern Shore to acquire compliance credits from the Potomac and Rappahannock basins.
7. Clarification of analytical and reporting requirements.
8. A requirement that offsets required for the full 5-year term of the permit be provided at the time of registration. This new requirement will make the offset program more manageable by ensuring longer term planning by new and expanding dischargers.
9. Updated prices of TN and TP credit purchases from the Water Quality Improvement Fund based on the cost of projects financed by the fund over the previous permit cycle.
10. Establishing a baseline condition for offsets generated by new stormwater BMPs. This condition is necessary because no baseline condition had formally been established for this category of BMPs previously.
11. Deletion of Ortho Phosphorus monitoring requirements as enough data was generated in the first permit cycle to characterize the discharges for modeling purposes.

If the Board authorizes the public hearing, it would be held in late November or early December, 2010. The staff would then bring a final regulation to the Board for adoption at the March, 2011 Board meeting. This should allow the reissuance of the permit before the existing one expires on December 31, 2011.

Virginia Pollutant Discharge Elimination System (VPDES) General Permit for Discharges Resulting from the Application of Pesticides to Surface Waters (9VAC25-800): This is a new proposed regulation. The staff will ask the board to approve for public comment and hearing the regulation establishing the General VPDES Permit for Discharges Resulting from the Application of Pesticides to Surface Waters. A public comment period was issued from May 10 – June 18, 2010. A public meeting was held at DEQ’s Piedmont Regional Office Training Room in Glen Allen, Virginia on June 9, 2010 at 2:00 PM. Public comments are summarized below:

Commenter	Comment	Agency response
Buchanan, Randy - Virginia Mosquito Control Association	1) Our current position is to see a General State Wide Permit, with one registration (NOI) and reporting requirements that mirror our current record keeping requirements as mandated by VDACS. 2) We commend Virginia DEQ on its approach to developing this unfunded, mandated permitting requirement by the Federal Government. 3) We agree with the purpose in the NOIR Background Document. This general permit regulation is needed in order to comply with court ordered requirements for EPA and states to issue NPDES permits for...pesticide applications that are made in or over, including near, waters	Comments acknowledged: Concerns and recommendations taken into consideration during the discussions of the Technical Advisory Committee and the drafting of the draft General Permit.

	<p>of the United States (WOUS). 4) We boldly disagree with any statements that this permitting is being done on a national level to reduce the amount of pesticides that are applied to waters of the US. Note that FIFRA regulated labels will still govern application sites & rates for pesticide applications. The real need for this permit is to replace the legal basis for pesticide applications that FIFRA will no longer govern as of April 10, 2010. 5) Although we don't think that public health pesticide usage should be governed by the CWA, we look forward to working toward a workable permit that is as least burdensome as possible to all parties involved. 6) In a nutshell, we would like to see a 5 year permit with one registration (NOI) and reporting requirements that mirror the current VDACS record keeping requirements as close as possible. 7) In reviewing the draft EPA permit we would like to make additional comments: 1.0 Coverage under This Permit: 1.1.2.3 Discharges Currently or Previously Covered by another Permit: Comment: References to pesticides, herbicides and fertilizers in a VPDES General Permit for MS4, Storm Water Management Program A.1.a.5 should not be construed as pesticide applications to WOUS covered by the VPDES Storm Water Permit; 5.0 Pesticide Discharge Management Plan: 5.1.1 PDMP Team: Comment: Many localities utilize seasonal employees that are VDACS certified pesticide applicators for mosquito control pesticide applications. Consideration should be given to facilitating the addition and removal of PDMP Team member names; 5.0 Pesticide Discharge Management Plan: 5.1.2 Pest Management Area Description; c. General location map. This section references 'location of waters of the US': Comment: We do not have inclusive maps of locations of WOUS nor do we have the legal authority to delineate WOUS. This authority lies with the US Army Corps of Engineers (USACOE) and this requirement will add a substantial burden to the agency. Note is delineation authority was transferred to 'operators' this would be the addition of an unrealistic task. 8) Additional Comments: We have a general concern that with this new permit, we will be altering or duplicating the requirements of our current jurisdictional agency, VDACS. Record keeping time frame requirements will be increased from 2 years to 8 years. Pesticide accident reporting requirements will also be complicated. 9) One last comment is our concern for the lack of recognition of the benefits of our bio-rational pesticides.</p>	
Carlock, John M. - Hampton Roads Planning District Commission	<p>1) Utilities throughout the region use pesticides specifically for the control of algae in water supply reservoirs. The selection and application of algaecide products is already highly regulated by the requirements of the Federal Insecticide, Fungicide and Rodenticide Act (FIFRA), as well as the Virginia Department of Agriculture and Consumer Services Pesticide Applicator Certification Programs. 2) Similarly, local mosquito control programs are already highly regulated and necessary to ensure public health. Additional regulatory requirements would not aid in an improved program. 3) Because of VDACS requirements for all categories of certified pesticide applicators, any record-</p>	<p>Comments acknowledged: Concerns and recommendations taken into consideration during the discussions of the Technical Advisory Committee and the drafting of the draft General Permit.</p>

	<p>keeping requirements should mimic those requirements to avoid double reporting and records for the applicator. 4) Several definitions within the regulation need clarification: Specifically, 'near' surface waters. This has the potential to include all types of landscaping companies. Will this apply to the myriad of stormwater management ponds in the Commonwealth, which are already regulated under local stormwater permits for the most part? 5) If pesticide users are under the thresholds for requiring an individual or general permit, how will they be educated of their responsibilities under this regulation? 6) What remedies will be available for areas near Tier 3 or impaired waters for landscaping, mosquito control, stormwater pond management and the like?</p>	
Ewing, Amy M. - DGIF	<p>We have reviewed the public notice of intent to draft a proposal for the adoption of a new General Virginia Pollutant Discharge Elimination System (VPDES) Permit for pesticide discharges. We are supportive of this initiative.</p>	<p>Comments acknowledged.</p>
Frazier, Katie - Virginia Agribusiness Council	<p>1) Every effort should be made to ensure that duplicative processes will not be required of pesticide applicators as a result of this EPA permit. 2) Annual Thresholds - The relationship between contractors and property owners regarding meeting the annual thresholds should be examined further. 3) Co-permitting - Holding one party in a contract responsible for another's permitting requirements would be extremely confusing and detrimental to the permitted entities. Separate permits with separate permit liability for each permittee should be strictly maintained. 4) Multiple contractors - In some situations, a landowner may have multiple contractors applying different pesticides to the same land in one year for different purposes. How to avoid "double permitting" of that acreage and what is the landowner required to do in this situation? 5) Enforcement - What will be the enforcement provisions for non-compliance with the "permit-by-rule" (those not required to submit a NOI)? What will the enforcement provisions be for those required to have a general permit (required to submit a NOI)? 6) Recordkeeping - Efforts should be made to keep record-keeping requirements between state permitting programs (VDACS Pesticide Applicators regulations and DEQ's NPDES Permit regulations) consistent to alleviate confusion and duplicative efforts for permittees. 7) Definition of "near" waters of the United States - Needs to be further discussed with impacted parties to determine the most appropriate means of addressing this issue."</p>	<p>Comments acknowledged: Concerns and recommendations taken into consideration during the discussions of the Technical Advisory Committee and the drafting of the draft General Permit.</p>
McDonough, Peter - Virginia Golf Course Superintendent's Association	<p>We have many questions on how this process will unfold and what effect this will have on the golf industry's ability to utilize several key products that have EPA approved guide lines in place already. The public meeting held by DEQ on June 9th, 2010 brought forth many good points and concerns, here are a few of ours: Duplicating Permits for the same property; Definition of 'near' waters of the United States; Co-permitting; Enforcement; Recordkeeping; and Annual Thresholds. We expect further discussion on these and other permit scenarios that could affect our ability to enhance Virginia's economy.</p>	<p>Comments acknowledged: Concerns and recommendations taken into consideration during the discussions of the Technical Advisory Committee and the drafting of the draft General Permit.</p>

Moon, Michael C. - City of Manassas	1) It is the City's request that municipalities already regulated under the Department of Conservation and Recreation (DCR) MS4 storm water program be exempt from this regulation. This would be effectively layering the regulatory process which is not beneficial and would result in additional permitting costs that are unnecessary for cities/counties in the Commonwealth. 2) The City would request an exemption for jurisdictions in the Commonwealth that own, maintain, and/or operate their own water supply reservoirs for drinking purposes. These water supply reservoirs have historically treated aquatic weed and algae control for water quality purposes to control the organics entering the Water Treatment Plant (WTP). These WTPs are permitted and regulated by the Virginia Department of Health (VDH) and as such should not fall under a separate VPDES program for water supplies."	Comments acknowledged: Concerns and recommendations taken into consideration during the discussions of the Technical Advisory Committee and the drafting of the draft General Permit.
Ramaley, Brian L. - City of Newport News	1) The ability to control algae in our terminal reservoirs is critical to our ability to provide an adequate supply of high quality drinking water to our customers. In the past, we have asked DEQ to consider the terminal reservoirs as part of the water treatment process because they are located immediately adjacent to our treatment plants, and the water quality management activities in those reservoirs are driven by drinking water quality concerns...As the general permit is developed we again ask that the unique status of terminal drinking water reservoirs be recognized." 2) "Section 1.1.2.1 <i>Discharges to Water Quality Impaired Waters</i> of the Draft EPA General Permit includes an important element that we believe should be retained in the General Permit that will be developed by DEQ. Specifically, this language allows an operator to provide evidence that a water is no longer impaired, even if the water is currently listed as impaired for a pesticide or its degradates...In cases where adequate, recent data exist confirming that the designated uses are fully supported by the current water quality, operators should be given the opportunity to use the General Permit process." 3) "We also believe that it will be important for DEQ to include representatives from the drinking water industry as well as the Virginia Department of Health during the development of this new General Permit. This is to ensure coordination with current practices as well as existing regulations and designations for water supply reservoirs administered by VDH."	Comments acknowledged: Concerns and recommendations taken into consideration during the discussions of the Technical Advisory Committee and the drafting of the draft General Permit.
Umphlette, CB - City of Portsmouth	1) I cannot imagine that the development of the general VPDES permit will in any way contribute to improvements in the safety or quality of our drinking water or offer further environmental safeguards. New permitting requirements will needlessly create additional regulatory and operational burdens that must be borne by public utilities and add expenses which must ultimately be passed on to consumers as increased water rates. 2) "Our utility currently uses pesticides specifically for the control of algae in our water supply reservoirs. The uses and selection of algaecide products is already regulated by requirements to comply with existing Federal Insecticide, Fungicide and Rodenticide Act (FIFRA) requirements and VA Department of Agriculture	Comments acknowledged: Concerns and recommendations taken into consideration during the discussions of the Technical Advisory Committee and the drafting of the draft General Permit.

	Pesticide Applicator Certificates. Further, the active C++ ingredient of Copper Sulfate based algaecides is already a regulated contaminate in our drinking water. 3) The utility requires the flexibility to respond to algae problems within reservoirs when and where problem areas occur...the unpredictable occurrences of algae blooms, particularly the blue-green algae most associated with taste and odor problems demand a freedom of action regarding treatment decisions that I fear will be hampered by further regulatory demands. I fear that additional regulations will only slow and burden our current program without any gains of safety to the environment or our water customers. 4) I would encourage the regulators to exempt public water suppliers from any further regulation in the proper use of these pesticides.	
Walek, Jack - Lawn Doctor of West Henrico	1) Including near surface waters should be clarified to indicate waters up to the water's edge, or below the high tide edge, or only in moving or flowing streams and ditches. 2) Ground applications to established grass above the water line should fall under the regulations governed by VDACS Pesticide Services.	Comments acknowledged: Concerns and recommendations taken into consideration during the discussions of the Technical Advisory Committee and the drafting of the draft General Permit.

Participatory Approach/Technical Advisory Committee

Using a participatory approach to develop these regulations, a 21-person Technical Advisory Committee (TAC) was formed to assist the department in the development of a VPDES general permit for discharges from pesticide applied directly to surface waters to control pest, and/or applied to control pests that are present in or over, including near, surface waters. The TAC's primary responsibility was to collaboratively contribute to the development of a VPDES General Permit for Pesticide Discharges that is in the best interests of the Commonwealth as a whole. The staff discussed the comments and concerns raised as part of the NOIRA process with the technical advisory committee and provided an initial draft of the EPA Draft Pesticide Discharge Permit during the first meeting held on July 14th. The TAC met for three additional meetings (July 28th; August 6th and August 18th) to discuss the development of a Virginia Draft Pesticide Discharge Permit Regulation. During the course of those meetings many alternatives were considered and the agency has developed a proposed regulation that gained the concurrence of the stakeholders in the technical advisory committee. The agency believes the proposal represents the least burdensome and intrusive alternative that meets the essential purpose of the action.

Background

The proposed action is to develop and issue a VPDES general permit for discharges from pesticides applied directly to surface waters to control pests, and/or applied to control pests that are present in or over, including near, surface waters. The general permit regulation is needed in order to comply with court ordered requirements for EPA and states to issue NPDES permits for both chemical pesticide applications that leave a residue or excess in water, and all biological pesticide applications that are made in or over, including near, waters of the United States. This new requirement is in addition to existing Federal Insecticide, Fungicide, and Rodenticide Act

requirements that are implemented by the Virginia Department of Agriculture and Consumer Services under the Pesticide Control Board.

Since the Court ruling, EPA collected and analyzed data on pesticide applications, including labeling requirements, pesticide uses, best management practices employed to minimize the impact of pesticides on water quality, and existing state water quality standards for pesticides. EPA proposed a NPDES Pesticides General Permit that will be issued by them for areas where EPA remains the NPDES permitting authority and for the delegated NPDES states (like Virginia) to use in drafting their permit.

The following pesticide uses will be covered under the General Permit per the court order for operators that apply pesticides in or near water:

- Mosquito and other flying insect pest control
- Aquatic weed and algae control
- Aquatic animal pest control
- Forest canopy pest control

The regulation generally follows EPA's proposed pesticide general permit with definitions, eligibility requirements (authorizations to discharge), technology effluent limitations (integrated pest management considerations), water quality based limitations, monitoring requirements, pesticide discharge monitoring plan, corrective actions, adverse incident and spills and leaks reporting, recordkeeping and annual reporting requirements and conditions applicable to all permits. However, the EPA proposed general permit was adjusted for Virginia users for clarification, flexibility and ease of implementation.

Issues

Pertinent matters of interest are that this permit differs from the EPA proposed pesticide general permit in that this permit does not require submittal of a 'registration statement' or 'notice of intent' from the pesticide operators that wish to be covered under the permit. Since registration statements would only provide very general information the staff does not believe that registration statement should be required. Not requiring registration statements also eliminates staff resources needed to review registrations, send out acceptance letters and other correspondence normally associated with registrations. All operators falling under one or more of the four pesticide 'uses' are automatically covered for discharge to surface waters. This is allowed under the VPDES permit regulation at 9VAC25-31-17- B 2 a. Since there is no registration requirement, there is also no fee requirement.

Another matter of interest is that permit coverage is only being issued for a 2-year period rather than the standard 5-year coverage. EPA is expected to issue their final pesticides general permit by the end of this year. Based on the substantial comments EPA has received on their draft permit, and recent legislation that has been introduced in Congress to modify some of EPA's requirements, it is likely that the TAC would need to be reconvened to consider changes to Virginia's permit based on changes EPA makes for their final permit. The use of this 2-year permit will allow Virginia to put in place a general permit by the court required deadline and also provide a reasonable time to evaluate the federal permit to incorporate appropriate changes for the reissuance of the Virginia general permit in June 2013. The Virginia 2-year permit, if approved by EPA, will also provide a timing off-set to future EPA general permit reissuance (every 5 years) and allow more time for DEQ to react to future changes in the EPA requirements.

This proposed general permit is protective of water quality; matches up with current Virginia Department of Agriculture and Consumer Services requirements; fits the intent of the court-decision; and allows more time to digest any changes that EPA makes to the requirements based on comments received or legislative changes.

The definition of operator in 9VAC25-800-10 provides that more than one person may be responsible for the same discharge resulting from pesticide application. This matches the EPA definition. This has caused some concern by the public in that there are overlapping responsibilities. This was discussed in great detail with the technical advisory committee and it was eventually determined to keep the definition of operator as proposed in the federal general permit. Other alternatives were provided to ease this concern (such as no requirement for registration statements and only adverse incident annual reporting). Some operators (e.g., those that exceed the acreage thresholds) will have additional reporting requirements but all operators are required to consider integrated pest management practices and decisions in their operation, and report annually any adverse incidents.

Operators exceeding pesticide application thresholds have more recordkeeping requirements than operators falling under the threshold. This is within the spirit and intent of the EPA permit. However, the threshold limits identified in 9VAC25-800-30 C Table 1 were generally considered by the TAC and other interested stakeholders to be too low. It was decided that at this stage of the process there was not time to adequately research revised numbers and be able to have the justification in place to be considered by EPA.

A final issue is that the EPA proposed pesticide general permit prohibits coverage under the general permit in 'exceptional' or 'tier 3' waters. Virginia's water quality standards in the antidegradation policy at 9VAC25-260-30 A 3 allows for temporary discharges to tier 3 waters. The Virginia proposed pesticide permit recognizes this allowance and states that discharges resulting from the application of pesticides are temporary and allowable in exceptional waters (see 9VAC25-260-30 A 3 (b) (3)). Staff believes it is important to allow pesticide application in exceptional waters because there are situations where the pesticide application may be for the express purpose of protecting or restoring the exceptional waters. For example, a gypsy moth infestation if left unchecked could adversely affect water quality by 1) increase siltation from rapid runoff of rainfall from defoliated areas; 2) increase in water temperature as the stream flows through areas made shadeless; and 3) nutrient overloading from the deposition of large quantities of caterpillar droppings.

Impact

It is anticipated approximately 400 pesticide businesses (including local governments) could be impacted by this new general permit regulation. Businesses that apply pesticides exceeding a certain annual threshold will be required to develop a pesticide discharge management plan, and to keep additional pesticide application records. All operators, regardless of the number of acres on which they apply pesticides, will be required to consider integrated pest management decisions in their operations and submit an annual report to the Department of Environmental Quality of any adverse incidents.

Report On Facilities In Significant Noncompliance: Three permittees were reported to EPA on the Quarterly Noncompliance Report (QNCR) as being in significant noncompliance (SNC)

for the quarter ending March 31, 2010. The permittees, subject facilities and the reported instances of noncompliance are as follows:

1. Permittee/Facility: **Arlington County, Arlington County Water Pollution Control Facility**
Type of Noncompliance: **Failure to Meet Interim Effluent Limits (Phosphorus, Carbonaceous Biochemical Oxygen Demand and Total Suspended Solids)**
City/County: Arlington, Virginia
Receiving Water: Four Mile Run
River Basin: Lower Potomac River Basin
Impaired Water: Four Mile Run is listed as impaired for *E. coli* and PCBs in fish tissue. The sources of the *E. coli* impairment are listed as pet wastes, waterfowl and illicit connections to storm sewers. The source of the PCB impairment is unknown.
Dates of Noncompliance: January and March 2010
Requirements Contained In: Consent Order
DEQ Region: Northern Regional Office
The County is in the final phases of an upgrade and expansion of the Facility. The upgrade and expansion was required by the Board in a Consent Order issued in March of 2005. The violations noted above are addressed in a separate order to be presented to the Board for its approval at its September meeting. The proposed order assesses a penalty for violations of the 2005 Order's interim effluent limits as well as for several dry weather bypasses at the Facility which occurred in 2009 and 2010. The County expects to complete the upgrade and expansion required by the 2005 Order in advance of the Order's deadline.
2. Permittee/Facility: **New Kent County, Parham Landing Wastewater Treatment Plant**
Type of Noncompliance: **Failure to Meet Effluent Limit (Total Kjeldahl Nitrogen)**
City/County: West Point, Virginia
Receiving Water: Pamunkey River
Impaired Water: The Pamunkey River is listed as impaired for *E. coli*, mercury in fish tissue, chlorides, enterococci, low dissolved oxygen and due to eutrophication caused by over-enrichment of nutrients. The source of the *E. coli* impairment is unknown. The cause of the mercury impairment is listed as atmospheric deposition from an unknown source. The high levels of chlorides are the result of natural conditions. The source of the enterococci is unknown. The sources of the dissolved oxygen impairment are listed as agricultural runoff, atmospheric deposition, industrial discharges, municipal point source discharges, point source discharges originating from outside the Commonwealth, contaminated stormwater discharges, sanitary sewer overflows and combined sewer overflows. The source of the nutrients is unknown.
River Basin: York River
Dates of Noncompliance: January, February and March 2010

Requirements Contained in: VPDES Permit

DEQ Region: Piedmont Regional Office

Staff from the Piedmont Regional Office are evaluating the need for enforcement action in this matter. The Total Kjeldahl Nitrogen violations appear to be related to the inhibition of biological treatment systems that can be caused by cold weather. The County intends to eliminate a large portion of the discharge from the Plant through water reclamation and reuse. In addition, the County is upgrading the treatment processes at the plant. Wastewater reuse is anticipated to begin in the fall of this year with completion of the facility upgrade scheduled to be completed in the same time period.

3. Permittee: **Town of Warrenton, Warrenton Sewage Treatment Plant**

Type of Noncompliance: **Failure to Meet Effluent Limit (Carbonaceous Biochemical Oxygen Demand)**

City/County: Warrenton, Virginia

Receiving Water: Great Run

Impaired Water: Impaired for fecal *E. coli*. The sources of the impairment are listed as pet wastes, livestock, waterfowl, wildlife, septic system discharges or unknown.

River Basin: Rappahannock River Basin

Dates of Noncompliance: December 2009 and January 2010

Requirements Contained In: VPDES Permit

DEQ Region: Northern Regional Office

Staff from the Northern Regional Office staff do not anticipate the need for enforcement action in this matter. The effluent limit violations were apparently related to start up operations of the upgraded Plant. As is the case with wastewater treatment systems which rely on microbial organisms to treat wastewater, it can take from thirty to sixty days to build up sufficient biomass to treat wastewater to the degree necessary to meet permit limits. No effluent limit violations have occurred since January of this year.

George W. Kemper IV, Rockingham County - Consent Special Order w/ Civil Charges:

George W. Kemper IV, operates in the Commonwealth of Virginia as a Poultry Grower within the meaning of 9 VAC 25-630-10 et seq. (i.e. he owns or operates a confined poultry feeding operation). Mr. Kemper failed to maintain current poultry waste transfer records as is required by 9VAC 25-630-50 Part (I)(B)(4)(b) and stored poultry waste outside, uncovered and unprotected from storm water runoff, wind and precipitation in violation of 9VAC 25-630-50 Part (I)(B)(2). DEQ issued a Notice of Violation (NOV) to Mr. Kemper on February 18, 2010 for these violations. On March 18, 2010, DEQ staff met with Mr. Kemper to discuss the noted violations. Mr. Kemper submitted documentation during the March 18, 2010 meeting confirming that he had returned the facility to compliance. To comply, Mr. Kemper submitted his current poultry waste transfer records which documented that he had sold approximately half of the noted poultry waste pile and provided photographs documenting that he had covered the remainder of the poultry waste pile with tarps. DEQ staff performed a follow-up inspection on May 5, 2010, confirming that the remainder of the poultry waste pile had been removed. The cost to comply with the order was minimal, as the cost to purchase tarps for the poultry waste pile would not have exceeded \$250. The Order does not contain any corrective action plan. Civil Charge: \$1,000.

Lunenburg County, Lunenburg Co. - Order by Consent - Issuance: In late 2003 Lunenburg County proposed a construction project to expand and renovate the County's Courthouse Complex

located in Lunenburg. The environmental consultant for the project specified a MicroFAST (Fixed Activated Sludge Treatment) Model 3.0 system manufactured by Bio-Microbics, Inc. to treat the wastewater generated by the Administrative Complex. The Department received a VPDES Permit application on May 20, 2003, and issued a Permit on February 9, 2004. The facility began discharging and the County submitted effluent monitoring data to the Department in January 2007, which revealed noncompliance with the CBOD₅, TKN, and TSS effluent limitations contained in the Permit. Department staff discussed the nature of the problems presented at the start-up of the treatment system with the County's contract operator, and the modifications made to increase the removal efficiency and efforts made towards a return to compliance. Enforcement staff met with the County's wastewater operator and maintenance personnel, a manufacturer's representative from Bio-Microbics, Inc., and the County's environmental consultant on December 3, 2007. The manufacturer's representative inspected the system, and discovered that the PVC air supply line to the airlift pump was cracked, which was repaired immediately. The representative also performed a survey of the cleaning and sanitation chemicals used by the County's janitorial staff to determine potential impacts to the bioreactor. With the repairs made and source control practices in place, the County experienced continued noncompliance throughout 2008 and 2009. The County's environmental consultant met with enforcement staff on December 19, 2008, to discuss the proposed enforcement action, and the submission of a Plan of Action (POA) to achieve compliance with the effluent limitations contained in the Permit. The development of a no-penalty Consent Special Order with a Schedule of Compliance was discussed, and the consultants agreed to submit a POA by January 31, 2009. The POA was received by the Department on February 19, 2009, and described waste characterization sampling and proposed modifications to the treatment process. The review process was completed and approval of the POA was made on May 19, 2009. A follow-up enforcement meeting was held in Lynchburg on January 21, 2010 with Department staff and the new Chairman of the County Board of Supervisors, Mr. Wayne Hoover. Mr. Hoover explained that the Board was unaware of the extent of noncompliance the facility had experienced, and that the County was prepared to take legal action against the environmental consultant that was responsible for the installation of the wastewater treatment system. A revised POA was submitted by Hurt & Proffitt on June 28, 2010, notifying the Department that the County would be constructing a sub-surface drain field and going to a no-discharge system. The proposed enforcement contains a Schedule of Compliance with deadlines for construction of the replacement wastewater treatment system.

Halifax County Service Authority - Maple Avenue WWTP, Halifax Co. - Order by

Consent - Issuance: The Halifax County Service Authority ("Authority") assumed ownership of the water and wastewater infrastructure formerly owned by the towns of Halifax and South Boston effective June 30, 2007. The Authority has made significant operational improvements since taking over from the previous owners. According to a comprehensive study completed by Draper Aden, the 20-year projected flows for the Maple Avenue Wastewater Treatment Plant ("Facility") will be 2.954 million gallons per day (MGD). The Authority notified the Department on February 8, 2010 that the Facility had exceeded 95% of its current design flow of 2.0 million gallons per day (MGD) for the months of November and December, 2009, and January 2010. The Authority began incurring violations at the Facility in November 2009 which consisted of BOD and TSS Permit effluent limit exceedances as well as unpermitted discharges. Reportedly the violations are attributed to heavy rainfall events which occurred across the service area. The Authority met with DEQ staff on March 23, 2010 to discuss the wet weather issues and the corrective action required to return to compliance. The Authority presented the Department with a copy of the Preliminary Engineering Report (PER) for the expansion of the Facility from its current design flow of 2.0

MGD to 4.0 MGD. The Authority has subsequently obtained \$15,000,000 in funding from a combination of grants and loans from the United States Department of Agriculture – Rural Development Office, USEPA State and Tribal Assistance Grant (STAG), and the Virginia Tobacco Indemnification and Community Revitalization Commission. The proposed enforcement action will allow the Authority to expand the Facility, which includes the installation of an equalization structure and an ultraviolet disinfection system. The proposed Order contains a Schedule of Compliance presented in Appendix A., and contains one compliance item that precedes the effective date of the Order. Item 1. requires the Authority to enter into a contract for engineering services for the Maple Avenue WWTP upgrade on or before July 31, 2010. The Authority signed a contract with Dewberry and Davis, Inc. of Danville, Virginia on July 15, 2010.

Roanoke Electric Steel, d.b.a. Steel Dynamics – Roanoke Bar Division, Roanoke - Consent Special Order with Civil Charge – Issuance: The Roanoke Electric Steel, d.b.a. Steel Dynamics – Roanoke Bar Division (“RES”) owns and operates a wastewater treatment plant (“Plant”) rated at 0.0673 MGD in the City of Roanoke. A complete and approvable application for reissuance of the Permit was due December 11, 2009. On December 10, 2009, the Department received an application for reissuance. The application was deemed incomplete in a letter to RES dated December 29, 2009. Significant incomplete portions of the application included missing throughput data and monitoring data for both treated process wastewater and stormwater. On March 10, 2010, DEQ issued Warning Letter No. W2010-03-W-1003 to RES citing the violations listed in the table above. On April 6, 2010, DEQ issued Notice of Violation (“NOV”) No. W2010-04-W-0001 to RES citing the same violations. On April 20, 2010, J. Cary Lester, Environmental Affairs Director for RES, met with DEQ staff to discuss the NOV and the remaining items RES still needed to provide to complete its application for Permit reissuance. Because it had become evident by May 2010 that RES would not be able to provide all of the information necessary for permit reissuance before the Permit would expire, the Department negotiated a Consent Order with RES to require compliance with the existing Permit until reissuance. The Department received a complete application for re-issuance of the Permit on June 30, 2010. The Order before the Board includes a civil charge and requirements to: 1) comply with the terms of the permit that was issued on June 10, 2005 until a new permit is issued, 2) submit all data required for permit reissuance by July 1, 2010, and 3) correct any deficient submittals within fourteen days of notification by DEQ. Civil Charge: \$15,600.

Arlington County Board - Consent Special Order w/ Civil Charges: Arlington County (County) owns and operates the Arlington County WPCP (Plant). The County is authorized through Permit VA0025143 to discharge from the Plant via outfall 001 into Four Mile Run. The County’s enforcement history includes a referral to enforcement in 2003 due to the County bypassing the Plant’s treatment systems during periods of wet weather. Evaluations conducted by the County concluded the source of the bypassing was Inflow and Infiltration (I&I) stemming from housing foundation drains connected directly to the Plant’s sanitary sewer collection system. In order to eliminate the wet-weather bypasses, the County proposed certain improvements and upgrades to the Plant. These improvements along with a requirement to more fully research the cost of disconnecting the downspouts was memorialized in a Consent Order (2005 Order) between the County and DEQ effective March 23, 2005. The 2005 Order through Appendix A, paragraph 10 requires the County to use best efforts to treat wet-weather flows and to minimize bypasses during the construction period at the Plant. On January 20, 2009, DEQ received notification that an unauthorized discharge had occurred at the Plant for 15 hours and 55 minutes starting on January 17, 2009 at 1:00 pm through 4:50 pm and again on January 18,

2009 starting at 3:40 pm lasting through 3:45 am on January 19, 2009. The unauthorized discharge resulted in approximately 15.5 million gallons of partially treated sewage being discharged directly into Four Mile Run. This notification was more than 24 hours after the start of the discharge. Arlington provided the cause of the discharge as a partial power outage at the Plant during which the automatic switch to back-up power did not work leading to sections of the Plant not having power for approximately five hours. In addition to the power outage, Arlington stated that an inlet valve to the only EQ tank in service froze in a closed position, which Arlington believes resulted from a brick being used to prop open the vault hatch. On June 8, 2009, DEQ received notification from Arlington that an unauthorized discharge during dry-weather had begun at the Plant. Arlington later notified that the discharge started on June 8, 2009 at 12:05 am and lasted for 28 hours and 7 minutes to 4:12 am on June 9, 2009. Arlington stated that the bypass of secondary and tertiary treatment and the resulting unauthorized discharge stemmed from a planned shut down of the Plant for approximately 7.5 hours which led to the EQ tanks filling to capacity resulting in the bypass of all secondary and tertiary treatment and the unauthorized discharge of approximately 20.77 million gallons of partially treated sewage. Arlington notified DEQ on June 15, 2009 of another unauthorized discharge during dry-weather that began June 15, 2009. Arlington later notified that the bypass and resulting unauthorized discharge lasted for 21 hours and 25 minutes starting at 11:47 am on June 15, 2009 to 9:12 am on June 16, 2009 and was due to the failure of an emergency generator after a scheduled shut down of pump station power feed. The discharge resulted in approximately 17.81 million gallons of partially treated sewage being discharged directly into Four Mile Run. On November 30, 2009, Arlington reported an unauthorized discharge of approximately 12,800 gallons of sewage from the Windy Run Lift Station into Windy Run. Arlington asserted that the unauthorized discharge stemmed from a partial loss of power at the lift station and emergency generator firmware safety features preventing the generator from coming online. Arlington advised that this issue has been fixed to prevent its reoccurrence. On January 18, 2010, Arlington reported an unauthorized discharge of approximately 100,000 gallons of sewage and groundwater from a manhole into Doctor's Branch. In addition to the preceding unauthorized discharges, Arlington also failed to report the monthly concentration average limit (Geometric Mean) for *E. coli* on its January 2009 discharge monitoring report (DMR) due to a sample analysis that produced possible false positives and/or a high bias. Arlington experienced exceedances of the monthly concentration average limit and the monthly quantity average limit for Ammonia as N during the April 2009 and June 2009 monitoring period and failed to meet minimum pH permit limits during the February 2009 monitoring period. During the January 2010 monitoring period, Arlington reported exceedances of cBOD monthly concentration and mass loading limits and of its 2009 annual average Total Nitrogen concentration. For the March 2010, monitoring period, Arlington reported exceedances of the Total Suspended Solids concentration limits, the Total Phosphorus monthly average concentration and mass loading limits, failed to maintain the required Total Residual Chlorine (TRC) concentration, failed to operate and maintain the sludge pumps in accordance with the O&M manual, and failed to monitor a bypass for BOD. During the April 2010, monitoring period, Arlington failed to maintain the required minimum pH level on one day and failed to monitor for one of the 12 TRC samples required each day. No corrective action is being proposed under this Order. Arlington is scheduled to complete the upgrades required by the 2005 Order, which will remain in place, prior to the end of 2010. The end of this construction and increase in flow capacity at the plant should serve to eliminate future bypasses resulting in unauthorized discharges from the plant as well as reduce the potential for the permit limit exceedances Arlington experienced. For the remainder of the construction, Arlington has worked to ensure better communication with

contractors thereby reducing the potential for additional unauthorized discharges. Civil Charge: \$87,590.

Dominion Campground, Inc. for the Dominion Campground Sewage Treatment Plant, Spotsylvania Co. - Amended Consent Order with civil charge- Issuance: The Dominion Campground, Inc. (Dominion) owns and operates the Dominion Campground Sewage Treatment Plant in Fredericksburg, Virginia. Dominion has a history of enforcement with DEQ. The original Plant was a lagoon system which experienced violations of the Permit limitations for ammonia, BOD₅, chlorine, pH and DO. To resolve the Permit violations a Consent Order was issued to Dominion on July 1, 2003 (2003 Order). The 2003 Order which remains open required Dominion to construct a new sewage treatment plant (Plant) to replace the existing treatment plant (lagoon). The process of design and construction of the Plant was delayed due to the requirement for upgrading power service to the Plant, including new lines and a new transformer. The new Plant was placed into operation on October 6, 2008 and a Certificate to Operate (CTO) was issued to Dominion by DEQ on October 28, 2008. Beginning in May 2009, the Plant experienced high flows and from July through September 2009 flows to the Plant exceed 95% of design capacity. Dominion indicated that it believed the increased flows were due to Inflow and Infiltration (I&I) from precipitation occurring within the collection system of the Plant. During this time, Dominion experienced violations of the Permit Limits for TSS, TKN, and CBOD₅. Dominion has stated that the exceedances of the Permit Limits for TSS, TKN, and CBOD₅ that it experienced during the months of May through September 2009 were a result of hydraulic overloading caused by I&I. As a result of Permit violations reported during May 2009 through December 2009 Monitoring Periods, DEQ issued Notices of Violation (NOVs) to Dominion. In response to the violations, Dominion has made efforts to correct the problem. On September 23, 2009, 400 feet of collection system pipe was replaced attempting to correct the I&I issues at the Plant. On November 5, 2009, representatives of Dominion along with the Plant's contract operator, and the engineer met with DEQ to discuss the violations and the work that had been completed on-site. At the meeting, Dominion presented DEQ with a plan of corrective actions detailing multiple options to address the Permit exceedances and the hydraulic overloading due to Inflow and Infiltration (I&I) occurring at the Plant. Dominion stated various other potential sources of I&I within the collection system may exist and should be addressed in order to resolve the causes of I&I in the system and the Plant. The more specific corrective action plan is incorporated in Appendix A of the Order. The Order requires Dominion to submit a plan and schedule for the upgrading of the collection system. The costs associated with the construction of the Plant, previously completed repairs, and the items included in Appendix A of the Order will exceed \$200,000. Civil Charge: \$6,090.

Town of Alberta, Alberta WWTP, Brunswick Co. - Consent Special Order w/ Civil Charges: The Town of Alberta owns and operates the Alberta Wastewater Treatment Plant (WWTP). DEQ re-issued VPDES Permit No. VA0026816 (Permit) to the Town of Alberta on March 5, 2009, for the discharge from the Town's WWTP to Roses Creek. The Permit requires that the Town's WWTP discharge from outfall 001 comply with the effluent limits as described in the Permit. In 2008 and 2009, the Town's wastewater discharge failed to consistently comply with the copper (Cu) effluent limits as required by the Permit. A Notice of Violation (NOV) was issued to the Town on February 9, 2009, for failure to comply with the effluent limits for Cu. In May 2009, the Town submitted a plan and schedule for resolution of the Cu violations to DEQ for review and approval. During the remainder of 2009, the Town's WWTP discharge also failed to comply with total Kjeldahl nitrogen, ammonia as nitrogen, and carbonaceous biochemical

oxygen demand (CBOD) Permit effluent limits. The Town reported that these exceedences were reported to be operational issues or weather related. The Town was also cited for late submittal of the Operations and Maintenance Manual and late submittal of the Industrial Pretreatment Program/Significant Discharger Survey. Between February 2009 and May 2010, the Department issued five NOV's to the Town of Alberta for its failure to comply with the Permit. The Town of Alberta agreed to the Consent Special Order with the Department to address the above described violations. The Order requires that the Town notify DEQ of the alternative it chooses to bring the Town's WWTP discharge into compliance with Permit requirements; notify DEQ of the status of the installation and operation of the aeration/corrosion inhibiting system in the Town's potable water supply tank; apply for funding to construct the selected alternative; and by no later than June 30, 2011, submit to DEQ for review and approval final plans and a schedule to construct the selected alternative to bring the Town's WWTP into compliance with the final effluent limits in the Permit. The Order also requires the payment of a civil charge. Civil Charge: \$3,780.

BFI Waste Systems of Virginia L.L.C., Richmond - Consent Special Order - Amendment: Originally this site was a sand and gravel pit. The site is now owned by BFI and is known as the Old Dominion Landfill. The Landfill site is situated over a deposit of Miocene clay which BFI uses in the process of constructing disposal cells. This Miocene clay is fine, grey, compactable clay which contains a reduced form of sulfur. When exposed to oxygen, the reduced sulfur in the clay oxidizes and forms sulfuric acid. The sulfuric acid mixes with rainwater runoff lowering the runoff's pH. On November 21, 2002, Department staff observed low pH readings at the Route 5 Bridge on Almond Creek. Staff traced the source of the low pH readings back to the BFI property. Staff observed similar low pH readings on November 25 and December 2, 2002. On December 13, 2002, the Department issued a Notice of Violation (NOV) to BFI for pH water quality standard violations. On March 24, 2004 the Department issued a Consent Order which required BFI to apply for an individual permit and develop and implement a plan to ensure compliance with pH standards. BFI obtained the individual permit and has completed the Department approved plan by developing a number of stormwater best management practices (BMPs) designed to reduce runoff from areas of exposed Miocene clay. Compliance remains elusive, however, as VPDES permit limit exceedences continue to occasionally occur, especially when the clay pile is being worked and its working face is exposed. BFI reported several violations of Permit effluent limits for pH and TSS during the July 2007 through September 2009 monitoring periods. The Department issued a Warning Letter on January 31, 2008, and NOV's on May 19, 2008, June 5, 2008, April 8, 2009 and November 13, 2009, citing BFI for the pH and TSS violations mentioned above. The proposed consent order amendment incorporates new strategies for compliance with pH and TSS limits at the site. The cost of the injunctive relief is unknown at this time and depends on the extent of work needed at the Facility; however an upgrade to include pH adjustment may be needed and could cost as much as \$50,000. Civil Charge: \$13,100.

Town of Cape Charles Wastewater Treatment Plant, Northampton Co. - Consent Special Order with a civil charge: The Town of Cape Charles ("Town") owns and operates a wastewater treatment plant, which is subject to the Permit. Among other things, the Permit authorizes the Town to discharge treated municipal wastewater into Cape Charles Harbor from Outfall 001 within limits for pH, carbonaceous biochemical oxygen demand ("CBOD"), total suspended solids ("TSS"), dissolved oxygen ("DO"), *Enterococcus*, fecal coliform, and ammonia-nitrogen. The design flow for the plant is 250,000 gallons per day (0.25 MGD). The

Permit also requires the Town to monitor the discharge from Outfall 001 according to Permit parameters and submit the results on monthly discharge monitoring reports (“DMRs”) and prohibits the discharge of pollutants into State waters except in compliance with the Permit. The Permit further requires monitoring to be conducted in accordance with laboratory procedures prescribed in 40 CFR 136. The Town submitted DMRs to DEQ documenting the effluent characteristics for the January through December 2009 monitoring periods indicating the following exceedances of Permit limits: *Enterococcus* (9 months); fecal coliform (3 months); TSS (7 months); ammonia (7 months); DO (1 month); and CBOD (1 month). The Town also timely reported the overflow of sewage from a manhole in one of its pump station service areas, which resulted in the unpermitted discharge of about 1,500 gallons of untreated sewage into State waters (Cape Charles Harbor). On September 28, 2009, DEQ compliance staff conducted a routine inspection of the facility laboratory. This inspection revealed Permit deficiencies in the laboratory procedures for analyzing the concentrations of BOD and *Enterococci* that did not comport with 40 CFR 136. The Town was advised of its VPDES non-compliance issues in Notices of Violation (“NOVs”) dated August 3, 2009, September 14, 2009, October 6, 2009, November 3, 2009, December 7, 2009, and March 9, 2010. The Town responded to the NOVs by letters dated August 26, 2009, September 14, 2009, October 20, 2009, December 21, 2009, and March 22, 2010. It attributed the exceedances of TSS, fecal coliform and *Enterococci* to excessive duck weed in the plant’s holding (or “polishing”) pond, which causes excess solids in the effluent. The excess effluent solids, in turn, purportedly “masked” the ultraviolet lights in the effluent disinfection unit, which resulted in excess levels of fecal coliform and *Enterococci*. The Town noted that effectively inhibiting the growth of duck weed in the holding pond has been an ongoing challenge. The ammonia exceedances were generally attributable to the frequent inability of the plant to maintain adequate levels of dissolved oxygen in the effluent during hot weather due to aging, antiquated equipment at the plant. The Town noted that it would increase the level of maintenance on the plant’s blowers and nozzles to ensure maximum air flow. Permit exceedances in November and December 2009 were attributed to the extremely high flows through the plant after a November 11, 2009, storm event. The Town further responded that the overflow of sewage from the manhole was due to the buildup of grease in the sewer lines and that it would now be adding degreasers to the manholes upstream of all the pump stations every two weeks to reduce the levels of grease in the sewer lines. The Town also demonstrated that the laboratory deficiencies noted in the September 28, 2009, compliance inspection had been corrected. The Town had entered into two previous Letters of Agreement (“LOAs”) with DEQ that addressed the same concerns: in 2006 to address sanitary sewer overflows (“SSOs”) caused by infiltration and inflow, and in 2008 to address Permit-limit exceedances and deficiencies in operation and maintenance of the plant and associated laboratory. The Town completed all the corrective actions required by the LOAs. The Town is in the process of upgrading the wastewater collection system, which will reroute the flow away from a hydraulically overloaded pump station directly to the waste water treatment plant to reduce or eliminate SSOs. The Order notes that the monthly average influent flow to the plant exceeded the plant’s 0.25 MGD design capacity each month for the period September 2009 through February 2010. The Town expects the collection system upgrade to also reduce influent flow to the plant. The Town has also received funding from a number of state and Federal sources to construct a new plant and laboratory at a new location, which will replace the existing plant and laboratory. The contract to construct the replacement plant was awarded in September 2009, with construction scheduled to be completed by October 2011. As a final note, the plant has been assigned wasteload allocations for nitrogen and phosphorus under the General Permit VPDES Regulation for Total Nitrogen and Total Phosphorus Discharges and Nutrient Trading in the Chesapeake Bay

Watershed (“Chesapeake Bay Watershed General Permit”), which take effect January 1, 2011, nine months before the replacement plant is expected to be completed. The Consent Special Order (“Order”) would require the Town to pay a civil charge within 30 days of the effective date of the Order. The Order would also require the Town to comply with the Permit. However, in recognition of the antiquated equipment at the existing plant, which makes it difficult to consistently achieve Permit limits for ammonia, and the ongoing construction of the replacement plant, the Order requires the Town to operate the plant in a manner that produces the best quality effluent of which it is capable in order to minimize additional exceedances of Permit limits for ammonia until DEQ issues a certificate to operate (“CTO”) for the new plant. Likewise, it is problematic whether the current plant will be able to achieve the wasteload allocations for nitrogen and phosphorus assigned to it under the Chesapeake Bay Watershed General Permit. Thus the Order will establish interim limits of “NL” for nitrogen and phosphorus effective January 1, 2011, until the CTO for the upgraded plant is issued, but no later than January 1, 2012. The proposed order would also require the Town to provide quarterly reports on maintenance performed on the plant’s holding pond and disinfection unit and on the status of the projects to upgrade the plant and the wastewater collection system. Quarterly reports will be required until DEQ issues a CTO for the upgraded plant. The Town submitted its quarterly report on the maintenance performed on the plant before the date (July 10, 2010) required by the proposed order and a report on the upgrade projects on August 13, 2010. The projects to upgrade the plant and the collection system are both on schedule. Finally, the Order will require the Town, within six months of its effective date, to submit to DEQ a plan of action of how influent flows into the new plant will be consistently maintained below 95% of the design capacity as required by the Permit. Civil Charge: \$9,030.

KmX Chemical Corp., Accomack County - Consent Special Order with a civil charge: KmX Chemical Corp. (“KmX”) owns and operates a Facility where it receives liquid industrial chemical by-products from which it recovers ethanol and other organic solvents by distillation for resale. KmX is subject to Virginia Pollutant Discharge Elimination System (“VPDES”) General Permit for Storm Water Discharges Associated with Industrial Activity VAR05 through Registration No. VAR050491, which was effective July 1, 2009, and expires June 30, 2014. Storm water and surface-water runoff discharge from the Facility through six identified storm water outfalls. The discharge of any wastes or any noxious or deleterious substances into state waters except as authorized by the Permit is prohibited. On January 16, 2010, at about 2:00 AM, a local emergency responder (“responder”) received a citizen’s complaint concerning red coloration and a strong chemical odor in the water in the unnamed tributary downstream of the Facility. The responder traced the source of the discoloration and odor upstream to the Facility. The Facility was unattended, but the responder gained access using an emergency gate-opener in his possession. The responder observed a reinforced rubber hose connected to Tank 90, a 30,000-gallon enclosed steel tank. Tank 90 is part of a tank “farm” (Area Q) situated on a concrete pad that is surrounded by a concrete secondary containment berm. The hose was observed running from Tank 90 out of the bermed secondary containment area and under a fence to an area near the head of a ditch [later determined to be Outfall 002]. There was red liquid on the ground in the vicinity of Tank 90 and a strong chemical odor throughout the facility. The KmX Facility manager arrived to disconnect the hose. The Facility manager reportedly took water samples at several locations and provided split samples to the responder. DEQ compliance staff (“staff”) conducted a site visit of the Facility on January 20, 2010, and observed that the access panel of Tank 90 was open. Apparent rust was seen on the bottom and sides of the tank and a strong chemical smell was present. Staff interviewed the Facility manager who stated that

on January 15, 2010, at about 4:00 PM, an unsupervised KmX employee initially had followed KmX's standard procedure by emptying the process wastewater from Tank 90 into Tank 80, one of three large tanks where contaminated wastewater from throughout the facility is stored temporarily awaiting pickup by a wastewater disposal contractor. Tank 80 is located in a different tank "farm" (Area W) near both Area Q and Outfall 002. After transferring its contents to Tank 80, the KmX employee reportedly rinsed out Tank 90, but deviated from the standard procedure by discharging the tank wash water to the ground near Outfall 002. Outfall 002 is approximately 200 feet from Tank 90. According to the Facility manager, KmX's standard procedure is to discharge tank wash water to within the bermed secondary containment area and then transfer it from the secondary containment to Tank 80 or one of the other wastewater disposal tanks. KmX submitted to DEQ a written report dated January 20, 2010, which confirmed the account of the unpermitted discharge given to staff by the KmX Facility manager, also on January 20, 2010. The report estimated the amount of tank wash water discharged from Tank 90 at 700 to 1000 gallons. It stated that after the discovery of the discharge, KmX had pumped about 300 gallons of apparently contaminated water from Outfall 002 into Tank 80 and had taken samples of the water at all six of the facility's outfalls and had the samples analyzed at the facility's in-house laboratory for the chemical components typically found at the facility. The preliminary analysis showed that only the water sample taken from Outfall 002 was contaminated. It was reportedly 98.2% water with small amounts of various organic solvents with the remainder listed as "unknown" (i.e., components were at levels below the detection limits of KmX's testing equipment). Testing by an outside laboratory using a more precise analysis obtained similar results. It is assumed that the red coloration in the tank wash water was attributable to fine, suspended ferric oxide scale from the sides and bottom of Tank 90. KmX's January 20, 2010, report also indicated that the Facility operates only intermittently when there is enough feed to warrant the plant opening; that Facility employees would be receiving training in handling and managing hazardous materials; that KmX will be installing new technology at the Facility that will purportedly reduce the level of contaminants in its process waste water; and that KmX would be hiring a new plant manager for the Facility. KmX was advised of the above non-compliance issues in a Notice of Violation ("NOV") dated February 22, 2010. KmX responded to the NOV by telephone on March 9, 2010, and by electronic mail on March 15, 2010, affirming the information contained in its January 20, 2010, written response. The information was confirmed during a site visit by DEQ compliance and enforcement staff on March 31, 2010. The new Facility manager was on site and the new equipment had been delivered but not yet installed. The Consent Special Order would require KmX to pay a civil charge within 30 days of the effective date of the Order. To further promote full compliance, it would also require KmX submit to DEQ for review and approval within 90 days of the effective date of the Order a corrective action plan and schedule that would fully examine the root cause of the release and describe actions KmX has taken and plans to take to prevent future releases and to mitigate environmental damage in the event a release does occur. The plan and schedule will include a component on training Facility employees in managing tank wash waters. Civil Charge: \$9,100.

Metro Used Auto Parts, Inc., Chesapeake - Consent Special Order with a civil charge: Metro Used Auto Parts, Inc. ("Metro") owns and operates an automobile salvage yard ("Facility") in the city of Chesapeake, Virginia, at which used motor vehicles are dismantled for the purpose of selling and recycling used automobile parts and/or scrap metal. Storm water discharges from the Facility are subject to the Permit through Registration No. VAR050149, which was effective July 1, 2004, and expired June 30, 2009, and which was reissued July 1, 2009, and expires June 30, 2014. The Permit authorizes Metro to discharge to surface waters

storm water associated with industrial activity under conditions outlined in the Permit. As part of the Permit, Metro is required to provide and comply with a Storm Water Pollution Prevention Plan ("SWP3") for the Facility. On December 15, 2009, DEQ compliance staff conducted an inspection of the Facility that revealed the following: poor housekeeping practices; failure to perform quarterly visual examinations of storm water quality for two quarters, quarterly Facility inspections for four quarters, and an annual comprehensive site compliance evaluation; failure to perform benchmark monitoring of storm water discharges and two quarterly visual examinations of storm water quality during qualifying rain events; failure to maintain records of benchmark monitoring with the Facility SWP3; and failure to comply with SWP3 requirements by not identifying in the SWP3 and the accompanying site map the locations of all discharge points and the drainage areas associated with those discharge points. On February 3, 2010, DEQ issued a Notice of Violation ("NOV") advising Metro of the deficiencies revealed during the Facility inspection conducted on December 15, 2009. A consultant retained by Metro responded to the NOV by letter dated February 15, 2010, which included a revised site map depicting an additional discharge point and its associated drainage area. The response stated that: Facility employees have been trained on how and when to conduct Facility inspections and quarterly visual examinations and on proper housekeeping procedures; housekeeping deficiencies noted during the December 15, 2009, compliance inspection have been remedied; Facility employees have been provided an instructional video on the proper collection of storm water samples; and a rain gauge will be installed at the Facility prior to the next storm water sampling event. These representations were confirmed by a site visit by DEQ compliance and enforcement staff on March 1, 2010. The Consent Special Order ("Order") requires Metro to pay a civil charge within 30 days of the effective date of the Order. As noted above, Metro has addressed all Permit deficiencies, except for a SWP3 updated to include the subsequent information provided by the consultant. To ensure continued compliance with the Permit and the SWP3 the Order also requires Metro to submit by October 10, 2010, an updated SWP3 that includes the additional discharge point and the changes to best management practices contained in the consultant's February 15, 2010, response, and to submit documentation of routine inspections and visual examinations of storm water quality for four calendar quarters, with the first submittal also due by October 10, 2010. Civil Charge: \$4,060.

Town of Monterey - Monterey STP, Highland Co. - Consent Special Order Amendment:

The Town of Monterey ("the Town") owns and operates Monterey STP and the sewage collection system serving the Town in Highland County, Virginia. The Town has approximately 158 residents. The Permit allows the Town to discharge treated sewage and other municipal wastes from Monterey STP to West Strait Creek, in strict compliance with the terms and conditions of the Permit. Presently, the Town is subject to a Consent Order that became effective June 28, 2007, which provided a schedule to construct an upgraded STP capable of meeting the Permit's effluent limitations by December 13, 2009. Previously, the Town was subject to a Consent Order that became effective January 7, 2003, which provided a schedule to address significant I&I problems in its sewage collection system. The Town completed the I&I projects in the spring of 2006. Drier weather in 2005 and reduced flows at the STP led DEQ to cancel the 2003 Order, believing that the worst of the I&I was corrected, and to issue the 2007 Order to construct an STP upgrade to meet limits. However, wet weather in 2006 and 2007 indicated that while the frequency of high flow was reduced, there were enough sufficiently high flow events that the proposed upgraded plant would often not ensure compliance. On June 6, 2008, DEQ staff met with the Town to discuss the Town's submittal of the plans and specifications for the STP upgrade. Based on a review of the Town's flow records, DEQ

expressed concerns that the proposed plant would fail due to excessive peak flow events. On September 10, 2008, DEQ conditionally approved the plans and specifications for the STP upgrade with a design capacity of 0.12 MGD and issued a CTC. However, the CTC approval was conditioned on the Town entering into a consent order, as agreed, that incorporated a corrective action plan to further reduce excessive I&I in the collection system. The condition stipulated that a CTO would not be issued until the Town signed a new consent order with that I&I schedule. On May 6, 2008, October 6, 2008 and December 3, 2008, DEQ issued Warning Letters to the Town for violations of the 2007 Order's CBOD interim effluent limitations in January 2008, August 2008 and October 2008, respectively. On April 8, 2009, May 6, 2009, October 5, 2009, November 5, 2009, and December 10, 2009, DEQ issued Notices of Violation to the Town for violations of the 2007 Order's CBOD interim effluent limitations in February 2009, March 2009, August 2009, September 2009 and October 2009, respectively. Wet weather in late 2009 and early 2010 indicates that significant I&I problems continue to exist, as demonstrated by excessive peak flow/high flow events which can impact the new plant's performance if not addressed. The Town is presently constructing an upgraded sewage treatment plant designed to meet the Permit's final effluent limitations with a design capacity of 0.12 MGD. The upgraded STP will have the capability to treat wet weather flows up to 0.3 MGD. The 2007 Order required the STP upgrade to be online by December 13, 2009. On February 17, 2010, DEQ staff met with representatives of the Town to discuss the development of a plan to further address the Town's I&I problems and for completing construction of the STP upgrade. DEQ requested the Town submit a plan and schedule of corrective actions to address the problems. On February 18, 2010, VRO issued a Notice of Violation to the Town for violations of the 2007 Order's CBOD interim effluent limitations in December 2009 and failure to complete construction of the STP by December 13, 2009, in accordance with the 2007 Consent Order. The Town attributes the CBOD violations occurring after mid-April 2009 to the STP's reduced treatment capacity, when half of the treatment beds were taken offline in order to begin construction of the new STP in mid-April 2009. DEQ recognizes that the reduced treatment capacity has had an adverse impact on the wastewater quality. The Town also attributes the delays in completing construction of the new STP to a combination of extreme winter weather and the apparent necessity to extend the construction schedule during the contractor negotiations after the 2007 Order was signed. The proposed Order, signed by the Town on March 5, 2010, requires the Town to complete construction of the new STP and conduct certain I&I corrective actions to address collection system deficiencies. (Note: the construction of the new STP was substantially completed by June 8, 2010.)

Samuel Aman, Giles Co. - Consent Special Order w/ Civil Charges: In 2008, DEQ staff conducted a field investigation following a complaint concerning construction activities in a streambed. The DEQ inspector observed Mr. Samuel Aman conducting grading and construction activities on his property in a stream. The perennial stream had been channelized and excavation had impacted an adjacent wetland. No Department VWP permit application or U.S. Army Corps of Engineers (ACOE) permit application were on file for this site, and no permit had been issued for the site by the Department or by the ACOE. It was estimated that as much as 800 linear feet of stream impact had occurred due to stream excavation. An area of emergent wetland impact, approximately 0.57 acre, had occurred at the site adjacent to the stream channel realignment. A Notice of Violation was issued to Samuel Aman on April 25, 2008, for the unpermitted activities that included both stream and wetland excavation and filling. Samuel Aman agreed to a Consent Special Order with the Department to address the above described violations. Wetland area delineation and development and submittal of a site

restoration plan were satisfied prior to the 2010 September SWCB meeting and in accordance with the Order. The Order requires that Samuel Aman complete implantation of corrective measures according to a DEQ approved site restoration plan and payment of a civil charge. Civil Charge: \$48,750.

Courtney Development, Inc., Henrico Co. - Consent Special Order w/ Civil Charges: In 2001, DEQ issued VWP Permit No. 01-0081 to Courtney Development, Inc. The Permit authorized impacts to wetlands and surface waters associated with Crossridge, a 336-acre mixed-use development. The Permit required the preservation of an on-site unnamed tributary to Meredith Branch as a component of the compensation for impacts to surface waters. The Permit also required that all denuded areas be properly stabilized in accordance with Virginia regulations. On July 14, 2009, DEQ received a report of sediment in the unnamed tributary to Meredith Branch designated for preservation. DEQ staff investigated and observed sediment up to 14 inches deep along 800 linear feet of the tributary. The sediment originated from construction activities within the Crossridge development. A Notice of Violation was issued to Courtney Development, Inc. on November 2, 2009 for the unauthorized impacts to approximately 800 linear feet of stream channel. Courtney Development, Inc. submitted and, after DEQ approval, implemented a plan to remove the sediment from the stream channel. All corrective actions were completed in April 2010. Courtney Development, Inc. agreed to a Consent Special Order with the Department to address the above described violations. Because all corrective actions are complete, the Order requires only that Courtney Development, Inc. pay a civil charge. The cost of sediment removal was approximately \$8,000. Civil Charge: \$9,555.

Mr. Mike Leech / M&M Grocery, Patrick Co. - Consent Special Order with Civil Charge – Issuance: The Underground Storage Tanks (“UST”) at M&M Grocery (“M&M”), a convenience store in Ararat, Virginia, are owned and operated by Mr. Mike Leech. The UST registration form for M&M was most recently amended on July 15, 2009 to place tanks 1, 2 & 3 in temporary closure. M&M filed a separate form, also dated July 15, 2009, to add active tanks 6C, 7C & 8C. The three tanks that were in temporary closure were permanently removed as of June 23, 2010. Currently, two USTs contain gasoline and one contains diesel fuel. A DEQ inspector inspected M&M on June 27, 2007 and observed evidence of twelve violations of Underground Storage Tanks: Technical Standards and Corrective Action Requirements, 9 VAC 25-580-10 *et seq.* (“the Regulations”). During the inspection, the inspector observed that three USTs had been out service since March 2006. DEQ issued Warning Letter (“WL”) No. 07-07-WCRO-007 to M&M on July 27, 2007. The WL noted that the inactive USTs should be closed in accordance with the Regulations. On February 26, 2008, DEQ issued Notice of Violation (“NOV”) No. 08-02-WCRO-005 to M&M. The NOV cited seven violations of the Regulations, including deficiencies in release detection and cathodic protection. Five of the violations cited in the WL had been corrected between the dates that the WL and the NOV were issued. DEQ did not receive a response to this NOV. A DEQ inspector inspected M&M on July 15, 2009. During the inspection, the inspector: 1) observed evidence of continuing violations of the Regulations, 2) determined that the inactive tanks (Nos. 1, 2 & 3) were empty, and 3) gave the facility representative a Request for Corrective Action. DEQ issued NOV No. 09-08-BRRO-R-005 to Mr. Leech on August 13, 2009. This NOV cited the violations that were observed during the July 15, 2009 inspection. Mr. Leech signed a Consent Order on June 4, 2010. Remaining uncorrected requirements include: financial responsibility, certification of installation, release detection, and certification of closure of the tanks that were in temporary closure. The Order

before the Board includes a civil charge and deadlines to comply with the remaining uncorrected requirements. Civil Charge: \$12,000.

Laburnum, L.L.C., Henrico Co. - Consent Special Order w/ Civil Charges: Laburnum, L.L.C. owns three 10,000 gallon underground storage tanks and one 550 gallon used oil UST at the facility. On July 17, 2008, DEQ staff conducted an UST inspection at the property, and on September 26, 2009, DEQ issued a Notice of Violation for Laburnum's failure to have cathodic protection and release detection records, failure to report a suspected release, and failure to properly close a used oil tank, as well as several Stage II air program violations. Laburnum, L.L.C. immediately began to address the violations. The air program violations were resolved within 30 days of issuance of the NOV and are not included in the Consent Special Order. The suspected release was assigned Pollution Complaint # 2009-4023, and was closed following two quarters of groundwater well monitoring and comparison to monitoring results from a previously reported release at this site. The monitoring indicated that a new release had not occurred. The owner's consultant worked to address the release detection and corrosion protection issues and to close the used oil tank on site. Release detection is being performed and DEQ has received passing test results. The impressed current cathodic protection system was repaired and tested in August of 2008 and tested again in January of 2010, both times with passing results. The proposed Order requires that Laburnum continue to submit release detection records for the USTs for three consecutive months and payment of a civil charge. The cost of the work to correct the violations was approximately \$13,000. Because Laburnum has installed an automatic tank gauge, the cost of submitting the additional release detection records required by the consent order is approximately \$1,500. Civil Charge: \$6,000.

Rahim Corp., Powhatan Co. - Consent Special Order w/ Civil Charges: Rahim Corp. (Rahim) owns and operates the facility, on which 4 USTs are located. On December 8, 2008, DEQ staff conducted a compliance inspection of the USTs and noted the following violations. Rahim failed to submit an amended UST notification form for method of release detection and ownership, failed to perform required testing of the cathodic protection system for the USTs, to keep spill prevention buckets free of debris, to use an appropriate method of release detection, to provide records of piping and tank release detection, and failed to provide any financial assurance. A Request for Corrective Action was issued at the end of the inspection, and a Warning Letter was issued on March 27, 2009, with no response. DEQ issued a Notice of Violation on July 14, 2009. The proposed consent order requires that Rahim submit documentation of financial responsibility, contact a corrosion expert to review the cathodic protection tests, submit certified plans from the corrosion expert that outlines the required actions to provide adequate corrosion protection on the UST systems, perform and complete the plan, complete cathodic protection system testing, submit bi-monthly records of the rectifier log, and submit copies of the monthly tank release detection testing and monitoring records. The injunctive relief that Rahim will incur as a result of the violations was estimated to be approximately \$3,300. Civil Charge: \$13,900.

Eagle Transport of Virginia, Inc., Bluefield - Issuance of a Consent Special Order with a civil charge: Eagle Transport of Virginia, Inc. ("Eagle") operates a carrier trucking company specializing in the transport and delivery of liquid petroleum products in bulk via tractor trailer tankers. On September 9, 2009, DEQ received notification of a discharge of non-highway use diesel fuel at the PPI AST Bulk Plant 8-2. The discharge was reported to the DEQ and to Tazewell County officials, but only after a time lapse of approximately eight to ten hours from

the time the discharge occurred. Per reports submitted to DEQ, it appears that a PPI driver discovered product on the ground around the loading rack when he arrived at the location at approximately 4:00 a.m. PPI began a cleanup response and called Eagle at approximately 6:00 a.m., informing them of the discharge, and PPI's position that the discharge and cleanup were Eagle's responsibility. Mr. Ted Keffer, with Action Environmental, notified DEQ and Tazewell County Emergency Management personnel of the discharge at approximately 2:00 p.m., on behalf of Eagle. DEQ staff investigated the discharge as Incident Report ("IR") No. IR 2010-S-0081. Per written accounts received by DEQ from both Eagle and PPI, an Eagle driver arrived at the location within approximately an hour after midnight on September 9, 2009. The driver proceeded to offload the non-highway use diesel fuel, delivering a quantity of diesel fuel to one of two manifolded ASTs that was sufficient to cause the automatic overfill alarm on the AST to activate, automatically shutting down the fuel pumps. The driver was directed by the Eagle dispatcher, who had contacted and was so directed by the PPI dispatcher, to deliver the fuel remaining in the tanker to a PPI UST facility located at 716 Virginia Avenue, near the referenced AST location. However, the driver apparently waited until the auto-shutoff timing mechanism reset, allowing the pressurized delivery equipment to operate again, and resumed offloading operations to the ASTs, until the tanker was empty. Eagle contacted an environmental consultant, Action Environmental, who in turn contacted local environmental contractor Marshall Miller and Associates ("MM&A"). MM&A arrived at the scene later the same morning and continued the cleanup effort begun by PPI. Pads, booms, and a vacuum truck were used to recapture diesel fuel. The oil/water separator, which was inundated, was pumped. Excavation of soils began. At no time was a sheen reported as being seen on surface waters. It appears that most of the discharged diesel fuel that was not captured soaked into the soil. The site of the discharge has been a remediation site for a previous petroleum release (PC No. 2000-1000), with a previous site owner (Excello Oil) as the Responsible Party ("RP"), and Simon and Associates as their environmental consultant. Significant expenditures of state funds have been made for groundwater cleanup at the site. This work was very near completion. Monitoring wells already existed at the site. One monitoring well (MW-18), which previously had no free phase product present, measured 9 feet of product after this discharge. Other monitoring wells on site also appeared to show free phase product level increases. Appendix A of the draft Order contains a compliance schedule for groundwater monitoring. On September 28, 2009, Eagle submitted a written account of the incident. On October 1, 2009, PPI submitted a written account of the incident. Per figures submitted by PPI, after reconciling inventory with inputs and withdrawals, approximately 2,801 gallons of diesel fuel was discharged. Per written accounts received by DEQ from both Eagle and PPI, several hundred gallons of diesel fuel were pumped from the oil/water separator, with an additional volume of approximately 2,000 gallons of fuel/water mixture pumped as the oil/water separator was emptied. A total of 328.06 tons of impacted soils were removed for proper disposal. On November 17, 2009, the DEQ issued a confirmed release letter to Eagle. That letter required submittal of an Initial Abatement Report by December 30, 2009. On December 4, 2009, the Department issued NOV No. NOV-025-1209-GW to Eagle for a discharge of oil to the environment and for failure to report the discharge. On December 15, 2009, Department staff met with representatives of Eagle to discuss the incident. DEQ also received an Initial Abatement Report, submitted by MM&A on behalf of Eagle, on that date. Civil Charge: \$28,117.

IMTT-Virginia, Chesapeake Terminal, Chesapeake - Special Order by Consent with Civil Charge: IMTT-Virginia owns the aboveground storage tank ("AST") terminal facility in Chesapeake, Virginia. The 100-acre facility contains 24 ASTs with 1 million barrels of

petroleum product total capacity. The property is located on the Southern Branch of the Elizabeth River. On March 12, 2010, DEQ TRO Pollution Response Program (“PReP”) received notification of an overfill of heavy fuel oil (#6 oil) from storage tank #503 at the IMTT-Virginia Chesapeake Terminal. It was reported that the overfill occurred during a routine tank-to-tank fuel oil transfer at approximately 1:00AM on March 12, 2010 and resulted in a discharge of approximately 21,000 gallons of #6 fuel oil into the secondary containment area surrounding storage tank #503 and other nearby tanks. DEQ PReP staff confirmed that there was not a discharge to state waters or the environment of the #6 fuel oil from the secondary containment area. DEQ issued a Notice of Violation (“NOV”) dated March 24, 2010 to IMTT-Virginia for failure to follow safe fill, shutdown, and transfer procedures, which resulted in the discharge of the approximate 21,000 gallons of #6 fuel oil into a secondary containment area. On April 5, 2010, DEQ staff met with IMTT-Virginia to discuss the NOV. IMTT-Virginia acknowledged the failure to follow safe fill, shutdown, and transfer procedures and attributed it to operator error. Tank #503 did not have the capacity to receive the amount of #6 fuel oil being transferred to it from Tank #501 due to the operator incorrectly calculating the available storage capacity in Tank #503 prior to the transfer. IMTT-Virginia noted that a contractor had been hired at a cost of \$180,000 to recover the #6 fuel oil that had overflowed into the secondary containment. IMTT-Virginia also noted that the employee who made the error had been trained in safe fill, shutdown, and transfer procedures, but failed to follow them. According to IMTT-Virginia, the employee had been reprimanded and re-trained in these procedures. The Order requires payment of a civil charge only. The #6 fuel oil that overflowed Tank #503 was contained in the secondary containment area and was recovered. There was not a reported or observed release of the #6 fuel oil to the environment or state waters. The overflow was reported to be the result of a math error by an employee completing the transfer of the #6 fuel oil between Tank #501 and Tank #503. Civil Charge: \$1,300.

North Carolina & Virginia Railroad Company, LLC , Chesapeake - Consent Special Order with a civil charge: Chesapeake & Albemarle Railroad (“CA Railroad”) is a short-line railroad that operates between Edenton, North Carolina, and Chesapeake, Virginia, and provides transportation services for ready-mix concrete plants along its route. CA Railroad is a division of North Carolina & Virginia Railroad Company, LLC (“NCVA Railroad”). On March 26, 2010, a representative of NCVA Railroad reported to DEQ by telephone that a CA Railroad train had derailed in Chesapeake, Virginia, causing the discharge of approximately 2,000 gallons of diesel fuel into the Intracoastal Waterway (Albemarle Canal). DEQ staff (“staff”) responded to the call by site inspection also on March 26, 2010, and observed that a train comprised of two locomotives and thirty empty rail cars had collided with an open drawbridge intended to span the canal. The collision had apparently caused the rupture of the fuel tank of the lead locomotive, which was hanging partially off the bridge suspended above the canal. Cleanup efforts by an oil-response contractor were underway and the canal had been closed to vessel traffic. Oil-containment booms had been placed across the canal both upstream and downstream of the bridge and the oil floating on the surface of the canal had been surrounded by booms and was being removed from the containment area with oil skimmers and vacuums. Staff observed no oil on the shoreline and there were no reports of dead fish or other wildlife. Oil trapped within the bridge structure was emulsified and removed manually. Staff also observed that, when the damaged locomotive was removed from the bridge on March 27, 2010, no additional oil was discharged. A representative of NCVA Railroad submitted a “five-day” letter by electronic mail on March 30, 2010, stating that a detailed report was forthcoming (received, dated May 19, 2010). DEQ issued CA Railroad a Notice of Violation (“NOV”) on April 20, 2010, for the

discharge of petroleum to State waters. An environmental consultant responded to the NOV on behalf of CA Railroad by letter dated May 19, 2010. The letter attributed the collision of the train with the drawbridge to “human error alone” on the part of the train’s engineer who had reportedly been disciplined by a sixty-day suspension; no further information about the engineer’s error was provided. By examining fueling records and fuel-consumption data, the consultant estimated that approximately 1,000 gallons of diesel fuel had been discharged to State waters. The letter summarized the abatement actions taken by CA Railroad and its contractors in response to the discharge and included manifests reflecting that 8,300 gallons of oil-contaminated water and 41 drums of oily absorbent material had been collected and disposed of properly. The response noted further that abatement activities had been completed by March 30, 2010, and the canal reopened to vessel traffic within thirty hours of the discharge. The Consent Special Order (“Order”) would require NCVA Railroad to pay a civil charge within 30 days of the effective date of the Order. Civil Charge: \$15,099.

Issuance of VPA permit No. VPA01579 – Recyc Systems, Inc. (Shenandoah County): The permittee submitted a VPA permit application for issuance of the referenced permit to authorize the land application of biosolids at standard agronomic rates to agricultural fields in Shenandoah County, Virginia. Biosolids that are land applied must meet Class B pathogen reduction and vector attraction reduction requirements and contain levels of metals that do not exceed “Pollutant Concentrations” as specified in the VPA Permit Regulation. Identified in the permit application are approximately 638.3 acres of agricultural land on 2 farms. An informational meeting was held on March 3, 2009 in Woodstock. The initial permit application was modified prior to drafting the permit. Therefore, the permitting process for the first application package was put on hold. The permit process reconvened when the second, revised permit application package was received on September 1, 2009. A second public meeting was held on October 28, 2009 at the same location. On July 6, 2010 a public hearing was held in Woodstock. The public notice for this proposed permit action was published in the Northern Virginia Daily on February 26, March 5, 2010, and May 20th and 27th. The 30 day public comment period started on February 26, 2010 and concluded on March 29, 2010 for the public meetings. The public comment period for the hearing started on May 20th and concluded July 21st. During the public comment period on the draft permit, the agency received: 7 letters via postal mail and 19 e-mails from private citizens and Friends of the North Fork of the Shenandoah River objecting to the draft permit. Of the 26 comments received, 18 requested a public hearing. The public hearing yielded approximately 49 members of the public and County Board of Supervisors representatives. Twenty four (24) members of the audience spoke during the hearing. The Agency received 21 written comments for the comment period following the public hearing. Public comment received as a result of the public hearing on the issuance of VPA Permit No. VPA01579 for Recyc Systems, Inc. – Shenandoah County has been summarized below with DEQ’s response following each comment.

1. Concerns that land application activities will adversely affect the health of individuals with specific health concerns living near the proposed fields.

Staff Response

In accordance with Agency guidance, staff responded to individuals expressing specific health concerns that the local health district contact - Scott Fincham, Environmental Health Manager, Lord Fairfax Health District - should be contacted to discuss specific individual medical conditions. As of the date of this memo, Mr. Fincham has not been contacted relative to this permit action.

2. General opposition to land application of biosolids.

Staff Response

The DEQ appreciates the information provided by commenter's who are opposed to the land application of biosolids. The agency, however, is tasked with supporting environmental law through the enforcement of existing regulations. At the present time, the land application of biosolids is authorized and regulated in Virginia

3. Concerns of surface water and groundwater contamination, grazing restrictions, shallow soils including karst topography, floodplain storage and application, pathogens, heavy metals, pharmaceuticals, other chemicals and emerging contaminants, food safety, and nutrient loading are addressed below.

Staff Response

VPA Permit No. VPA01579 is written in conformance with all applicable State and Federal regulations and includes limitations and requirements designed to protect both surface and ground water quality. Based on more than 30 years of research and land application experience in the United States, the preponderance of the scientific literature indicates that the land application of biosolids, if performed in accordance with current State and Federal regulations, will cause no significant impacts to health or the environment, and is usually considered a beneficial use. DEQ policy and guidance require all permits, including the subject permit, be drafted with stringent limitations and requirements designed to protect both surface water and groundwater quality. Many of those limitations and requirements were developed by the Land Application of Biosolids Technical Committee - a cooperative effort of professionals and technical experts from DEQ, VDH, the Virginia Department of Conservation and Recreation's Division of Soil and Water Conservation, Virginia Tech, and others.

At a minimum, applications of biosolids are required to comply with the VPA Permit Regulation and EPA's Part 503 Biosolids Rule. These requirements include treatment to Class B (or better) pathogen levels; compliance with approved vector attraction reduction requirements (i.e., minimization of pests); compliance with specific site management restrictions with respect to turf and crop harvesting, grazing of livestock, and public access; and compliance with maximum and monthly average biosolids concentration limits for arsenic, cadmium, copper, lead, mercury, molybdenum, nickel, selenium, and zinc. Biosolids that meet the maximum and monthly average concentration limits for these nine metals are considered by EPA to have minimal metals concentrations. The U.S. Environmental Protection Agency has conducted surveys of sewage sludge throughout the United States to evaluate whether there are other constituents found in biosolids that would warrant further testing requirements before land application. Additional research is being conducted to determine not only the amount present, but also whether these amounts pose significant concerns. DEQ monitors the ongoing work of EPA in this respect, and if necessary, will respond to these findings with additions to the list of regulated parameters.

Additionally, biosolids applications are restricted such that the contamination of either surface or ground water is unlikely. Specific restrictions include the following:

- No point source discharge of pollutants to surface waters may occur except during a storm event greater than a 25-year, 24-hour storm;
- Biosolids loading rates are nitrogen-limited on all fields;
- Biosolids loading rates may be further restricted on fields testing high in soil phosphorus;
- No more than 15 dry tons/acre of biosolids may be applied during any one year;
- No more than 14,000 gallons/acre of biosolids may be applied during any one application;

- Biosolids applications are restricted during inclement weather;
- Biosolids may not be applied to slopes exceeding 15%;
- Biosolids may not be applied within specified buffer zones from streams, rock outcrops, sinkholes, roads, dwellings, wells, etc.;
- Additional biosolids management practices are required if biosolids are applied to bare fields and fields within the 25-year flood plain;
- Biosolids shall not be land applied to soils where the water table is less than 18 inches; and
- Biosolids shall not be land applied to soils where the depth to bedrock is less than 18 inches

4. Concerns that the land application activities may affect threatened and endangered species and/or their habitat.

Staff Response

A search of the Virginia Department of Game and Inland Fisheries, Fish and Wildlife Information Service website for Threatened and Endangered Species was conducted prior to drafting the permit. The search was a two mile radius search for individual species and their habitat. Because the search did not reveal any species or possible habitat within the two mile radius of the proposed application sites, no further action is needed by the Department or the applicant.

5. The land application of biosolids would be contrary to the goals of the Chesapeake Bay TMDL established by the EPA.

Staff Response

VPA Regulation 9VAC25-32-560.A.1 sets forth requirements for biosolids application rates, application timing, and site management conditions. These requirements include the development and implementation of a Nutrient Management Plan (NMP) based on soil conditions and crop requirements. The rate determined by the NMP limits Nitrogen and Phosphorous applications to prevent excess nutrient loading.

The Chesapeake Bay TMDL is still in development; therefore these comments will be further evaluated during the regulatory process and may affect future permit requirements.

6. The draft permit and the regulation are different for the frequency of sampling biosolids.

Staff Response

The draft permit lists the frequency for biosolids sampling by the amount of biosolids produced in dry tons per 365-day period. The VPA regulation under section 9VAC25-32-440 Table 1 lists the frequency for biosolids sampling by the amount of biosolids produced in metric tons per 365-day period. The amount produced is listed in two separate units, but are the same in both documents.

7. Soil samples should be collected and analyzed no more than 3 years prior to the biosolids application.

Staff Response

Permit Part I.A.3. states that soil monitoring must not be greater than 3 years old at the time of biosolids application. This is consistent with the Department of Conservation & Recreation - Nutrient Management Plan Special Conditions for Nutrient Management Plans Developed for Biosolids Applications July 2008.

8. Local government's authority and role in the permitting process.

Staff Response

This concern came up during the public hearing and Chairman Miles of the State Water Control Board addressed this issue at that time. Chairman Miles stated that this issue has

came up before, and that he hopes the County can appreciate that this is an issue to address to the legislature.

9. Wildlife and fisheries concerns from the land application and from stormwater runoff.

Staff Response

The Expert Panel response to this question was as follows:

“As long as biosolids are applied in conformance with all state and federal law and regulations, there is no scientific evidence of any toxic effect to soil organisms, plants grown in treated soils, or to humans (via acute effects or bio-accumulation pathways) from inorganic trace elements (including heavy metals) found at the current concentrations in biosolids.

Whether there are longer term chronic effects from bioaccumulation of pharmaceutical and personal care products and other persistent organic compounds that might be applied in biosolids is more difficult to measure, and has not been rigorously studied to date. There are gaps in the research to characterize the composition, fate, and effects of these constituents in biosolids, as well as in other products, materials and the environment. Furthermore, the relative importance and risk of these constituents, which have not been fully assessed, and their potential for bioaccumulation in plant crops and livestock are the subject of ongoing research.

In response to its findings related to these questions, the Panel recommends regular review of the research that pertains to biosolids and its fate and transport to livestock and plant crops, with summaries developed that would document any significant new findings.”

10. There were concerns about adjacent landowner notifications of land application activity.

Staff Response

Regulation section 9VAC25-32-530.B. states: “At least 48 hours prior to delivery of biosolids for land application on any site permitted under this regulation, the permit holder shall post a sign at the site that substantially complies with this section, is visible and legible from the public right-of-way, and conforms to the specifications herein. If the site is not located adjacent to a public right-of-way, the sign shall be posted at or near the intersection of the public right-of-way and the main site access road or driveway to the site. The department may grant a waiver to this or any other requirement, or require alternative posting options due to extenuating circumstances. The sign shall remain in place for at least 48 hours after land application has been completed at the site.”

11. Proper landowner agreement and consent must be obtained prior to permit issuance.

Staff Response

9VAC25-32-530.A. “A written agreement shall be established between the landowner and owner to be submitted with the permit application, whereby the landowner, among other things, shall consent to apply sewage sludge on his property. The responsibility for obtaining and maintaining the agreements lies with the party who is the holder of the permit.” The Agency has made a reasonable effort to ensure that the permit applicant address all concerns identified by the citizens of Shenandoah County.

12. Pretreatment compliance must be maintained to ensure a consistent product.

Staff Response

DEQ conducts compliance inspections of pretreatment facilities with the assistance of the receiving facility to assess the consistency of the wastewater delivered to that treatment facility. This helps ensure that the treatment facility maintains compliance with their permit issued by DEQ.

13. Local monitoring role and ability to receive reimbursement.

Staff Response

The State Code outlines the funding mechanism in which localities with duly adopted ordinances can request reimbursement for testing and monitoring conducted by a locality employee. The role of the local monitor is to monitor the use of biosolids to ensure state and federal requirements are met, just like a Virginia Department of Environmental Quality biosolids staff member. DEQ encourages local governments to exercise this ability to supplement oversight and provide a local presence where these activities occur.

14. State agency responses:

VDH – No comment on the draft permit was received from the VDH

DCR – No comment on the draft permit was received from the DCR

Additionally, comments regarding regulatory changes were received. Proposed biosolids regulatory amendments are currently in executive review and following approval will be submitted to the Virginia Registrar for publication in the Virginia Register of Regulations for a 60 day comment period. This comment period is the most appropriate time to address changes to the VPA biosolids regulations.

Issuance of VPA Permit No. VPA00053 – Agri-Services Corp. – Fauquier County: Agri-Services Corporation. submitted a Virginia Pollution Abatement (VPA) permit application for the land application of Biosolids. The Permit application included 622.8 acres on 21 fields of 2 farms owned and operated by the same individual. Notice for this proposed permit action was published in the *Fauquier Times Democrat* on March 10 and March 17, 2010. The 30-day public notice period was March 10 through April 9, 2010. The public notice comment period ended on April 9, 2010. DEQ received comment from 54 citizens. The public hearing was held on August 5, 2010, at the auditorium of Cedar Lee Middle School in Bealeton, VA. Mr. Robert Wayland served as hearing officer. An interactive informational session preceded the hearing.

- Three people attended and no oral comments were provided at the public hearing
- One comment/request for information was received prior to the hearing
- Written comments were not received after the hearing

A summary of the comments received during the public notice of the draft permit have been combined with the single commenter during the public hearing comment period. The summary along with staff responses follows:

1. Protection of Surface Water, Groundwater and Impaired Streams

The following comments were received about potential impacts to surface and groundwater:

- Groundwater is the predominant drinking water supply for the County
- Potential for contamination from runoff

Staff Response:

VPA Regulation 9VAC25-32-560.B.3.d.1 requires minimum setback distances for occupied dwellings, water supply wells or springs, property lines, perennial streams and other surface waters, intermittent streams/drainage ditches, all improved roadways, rock outcrops and sinkholes, and agricultural drainage ditches. These setback requirements along with 9VAC25-32-30.A that prohibits a discharge from a VPA permitted facility are designed to protect against surface and ground water contamination. Additionally, the agency inspection program is notified prior to land application of biosolids and inspectors monitor land application sites to ensure permit conditions are met and the biosolids are not leaving the site.

2. Biosolids Composition and Protection of Human Health and the Environment

Many comments were received expressing concerns over the composition of biosolids as it relates to human health and the environment. The comments included:

- Potential risks from unknown pathogens, metals and other contaminants
- Lack of significant research to assess risks to human health and the environment
- Long term effects
- Does the treatment process make the material 100% safe?
- Is the treatment process effective?
- Monitoring requirements for pre and post land application
- No standardization of material between sources
- Toxicity
- Require research prior to land application

Staff Response:

In accordance with House Joint Resolution No. 694, the Secretary of Natural Resources and Secretary of Health and Human Services convened a Panel of experts in 2007 to study the impact of land application of biosolids on human health and the environment. Information pertaining to the expert panel and the final report can be accessed at

<http://www.deq.virginia.gov/info/biosolidspanel.html>. The panel determined that “as long as biosolids are applied in conformance with all state and federal law and regulations, there is no scientific evidence of any toxic effect to soil organisms, plants grown in treated soils, or to humans (via acute effects or bio-accumulation pathways) from inorganic trace elements (including heavy metals) found at the current concentrations in biosolids.”

3. H1N1 Virus

Several comments were received expressing concerns about biosolids treatment as it relates to the H1N1 virus.

Staff Response:

Staff contacted the Virginia Department of Health (VDH) and it is their opinion that the virus would not survive the wastewater treatment process and therefore is not a factor during land application activities.

4. Wildlife

Comments were received concerning how wildlife moving thorough land application sites are affected by biosolids land application.

Staff Response:

This matter is germane to all biosolids land applications and was addressed as part of the development of the regulation. Staff believes the management requirements set forth by the VPA Regulation and the limited exposure of wildlife pose no greater threat than normal agricultural activity.

5. Liability and Remediation Plan

Comments were received questioning where the liability and damages rest in the event of a failure to meet safeguards and who specifically has the financial liability for cleaning the polluted waterways and adjacent properties.

One commenter requested a copy of the DEQ remediation plan for cleanup should contamination from biosolids land application occur. Specifically, “At a minimum, both companies should advise DEQ the guaranteed method of clean-up for any of the TNSSS contaminants should our analysis after sludge is spread show that any of the TNSSS contaminants are present in our lake that were not present in our base line analysis.

Staff Response:

The VPA Regulation 9VAC25-32-490 sets forth guidelines for compliance with biosolids use practices. The permit holder is responsible for ensuring that all federal, state, and local regulations are met. The permit holder is required, by regulation, to obtain financial assurance

should contamination due to non-compliance of the regulation be determined the permit holder would be liable and subject to enforcement action.

Requiring a remediation plan is outside the realm of the Permit Regulation and is not part of the issuance of the permit. The Permit Regulation does not require a remediation plan as such a plan would need to address site specific conditions. A remediation plan, if needed, would be developed at the time of the incident.

6. 2009 EPA Drinking Water Study

Several comments were received in regards to the new study of 200 chemical and microbiological contaminants in drinking water and in turn, sewage sludge.

Staff Response:

Results of this study, once available, will be monitored and will be further evaluated during the regulatory process and may affect future permit requirements.

7. Pollution Sensitive Sites

Several comments were received in regards to pollution sensitive sites (as determined by review by the Fauquier County Soils Specialist) and potential endangerment to public health and the environment.

Staff Response:

The VPA Regulation 9VAC25-32-560 sets forth guidelines for compliance with biosolids utilization methods that address soil suitability, biosolids application rates, operation controls, management practices, and buffer zone requirements. Pollution sensitive sites, as determined by DEQ, can be subject to further restrictions or exclusion from a permit.

8. Erosion Caused by Livestock

One comment was received concerning livestock carrying soil into a stream running through the permitted site that affects a downstream lake and eventually the Rappahannock River and Chesapeake Bay.

Staff Response:

DEQ met with the affected adjacent land owner on December 16, 2009 to review the concerns in question (specifically three fields that are adjacent to the stream). A revision to the permit resulted in the removal of two of the fields in question and increased buffer distances along the stream of the third field.

9. Medically Sensitive Individuals

Several comments were received questioning studies that had been conducted to protect individuals who are highly susceptible to respiratory illnesses.

Staff Response:

DEQ is not privy to individual's health information and therefore relies on the public to provide pertinent information during the comment periods. Staff consults with the Department of Health (VDH) for recommendations based on the information provided.

10. Land Application Banned in Other Nations

Several comments were received questioning why land application is allowed in the United States when other countries have banned the practice.

Staff Response:

DEQ cannot address actions of other countries, we may only address those that pertain to the laws and regulations set forth by the EPA and Commonwealth of Virginia.

11. DEQ's Responsibility to Adequately Inform the Public

Two comments were received in regard to DEQ's dereliction in adequately informing the public of the proposed permit action.

Staff Response:

DEQ held an informational public meeting in Warrenton, on June 16, 2009. Adjacent land owners were notified via USPS mail in advance and the meeting was advertised in the Fauquier Times Democrat on June 3, 2009. A thirty day public comment period followed the informational meeting. The public notice of the draft permit was published on March 10 and 17, 2010 and all citizens that had previously commented were notified of the pending permit action.

12. Bioaccumulation of Contaminants in Livestock

Comments were received in regard to the lack of research and studies pertaining to the accumulation of metals in livestock that has grazed pasture that has had Biosolids applications.

Staff Response:

In accordance with House Joint Resolution No. 694, the Secretary of Natural Resources and Secretary of Health and Human Services convened a Panel of experts in 2007 to study the impact of land application of biosolids on human health and the environment. Information pertaining to the expert panel and the final report can be accessed at

<http://www.deq.virginia.gov/info/biosolidspanel.html>. The panel determined “As long as biosolids are applied in conformance with all state and federal law and regulations, there is no scientific evidence of any toxic effect to soil organisms, plants grown in treated soils, or to humans (via acute effects or bio-accumulation pathways) from inorganic trace elements (including heavy metals) found at the current concentrations in biosolids.”

13. Targeted National Sewage Sludge Survey (TNSSS)

One commenter asked for copies analytical data from the approved biosolids sources, specifically, those parameters contained in the Environmental Protection Agency’s (EPA) 2009 TNSSS report.

Staff Response:

Staff provided the analytical results that were submitted with the permit application. Additionally the monthly and annual reports submitted by the contractor were provided. The permit Regulation 9VAC25-32 stipulates the minimum monitoring (parameters and frequency) that is required. The treatment facilities may monitor more frequently or for additional parameters but are not required to do so.

Board Approval for Submitting the “Bacterial Total Maximum Daily Load Development for the James River and Tributaries – City of Richmond” to EPA Region III for Review and Approval:

A Total Maximum Daily Load (TMDL) for bacteria (primary contact use) was developed for 12 listed impairments within the James River watershed. Approximately 50 non-tidal and 40 tidal river and tributary miles were included in this study. The watersheds of these impaired segments include drainage from Goochland, Powhatan, Henrico, and Chesterfield Counties as well as the cities of Richmond and Hopewell. Five segments included in this study were first listed on the 1998 Consent Decree. Inability to reach consensus on final TMDL loadings with the City of Richmond prevented VA DEQ from submitting the TMDL by the original due date of May 1, 2010. The EPA granted a one-time extension to allow the completion of the TMDL by VA DEQ; the new deadline is Oct. 1, 2010. The TMDL objective is to ensure the protection of the primary contact (or recreation/swimming) use. The TMDL was developed to: 1) meet the water quality criteria; and 2) result in in-stream water concentrations that do not exceed the primary contact use for bacteria.

In order to meet the TMDL objective, final bacteria load reductions were assigned to each of the twelve James River and its tributary segments, ranging from 0.1% to 97.5%. These final TMDL scenarios were derived from the water quality model based on specific reductions to specific source categories. In the final reduction scenario for Gillie Creek, the TMDL study showed that

a 95% reduction in bacteria loads beyond the controls listed in the City of Richmond's Long Term Control Plan (LTCP) for their Combined Sewer Overflow (CSO) system will be necessary in order to achieve water quality criteria for primary contact use. The City of Richmond contends that Gillie Creek does not support primary contact use due to the engineering of the Creek and the difficulties of public access. The City also states that the modeled reductions, if implemented, would cause financial hardship on the part of the City and their ratepayers. In response to the TMDL, the City of Richmond requested permission to conduct a Use Attainability Analysis (UAA) for Gillie Creek. Several public meetings and comment periods were held to allow stakeholder discussion and input regarding the TMDL study's recommended reductions. Such reductions will be achieved through specific Best Management Practices (BMPs) identified during Implementation Planning (IP), which will follow the approval of the TMDL by the SWCB and EPA.

Maximum allowable bacteria loads were identified in the TMDL for 12 River/Creek segments. Final TMDL reductions were:

Creek Name	TMDL ID #	Segment Description	303(d) List Date	Final TMDL Reduction (%)
Almond Creek	VAP-G01R-02	From headwaters to mouth at James River including tributaries	1998	66.5
Bernards Creek	VAP-H39R-10	Mainstem of Bernards Creek	2004	54.1
Falling Creek	VAP-G01R-03	Falling Creek Reservoir Dam to its mouth at the James River	2002	22.8
Gillie Creek	VAP-G01R-06	From headwaters to mouth at the James River	2004	92.8
Goode Creek	VAP-G01R-01	From confluence with Broad Rock Creek to its mouth at the James River	2002	92.4
James River (non-tidal, upper)	VAP-H39R-11	Mainstem of James R. v/w confluence of Tuckahoe Creek and William's Island Dam	2004; DELISTED 2008	Not Applicable*
James River (non-tidal, lower)	VAP-H39R-08	William's Island Dam at river mile 116.30 to Boulevard Bridge	1996; DELISTED 2008	Not Applicable*
James River (non-tidal, lower)	VAP-H39R-08	Boulevard Bridge to the fall line at Mayos Bridge	1996	97.5
James River (tidal)	VAP-G01E-01	From fall line at Mayos Bridge downstream to Appomattox River	1996	36.2
No Name Creek	VAP-G01R-08	Unnamed Tributary to James River (a.k.a. No Name Creek) mainstem and tributaries	2004	86.7
Powwhite Creek	VAP-H39R-05	From headwaters to its mouth at the James River	2002	72.3
Reedy Creek	VAP-H39R-06	From headwaters to its mouth at the James River	1998	0.1

*Due to the delisting of this segment in the 2008 Integrated Report, bacteria reduction was not necessary. A TMDL was developed for this waterbody should it return to the 303(d) impaired waters list in the future.

Background: The "Bacterial Total Maximum Daily Load Development for the James River and Tributaries – City of Richmond" began with public meetings and a comment period in summer 2006 and a second set of public meetings and comment period was held in early spring 2007.

Following the 2007 meetings, the TMDL was delayed pending the SWCB's decision on revision of the primary contact recreation standard (the standard remained the same). A third set of public meetings and a comment period were held in early spring 2009.

Revisions to the TMDL warranted an additional public comment review period in late winter 2009. The final TMDL scenario indicates that a bacteria reduction of 95% beyond what will be achieved by the scheduled improvements in the City's LTCP for the CSO system are necessary to reach attainment in the Gillie Creek watershed. The City of Richmond has repeatedly expressed their concerns during public comment periods regarding the modeled TMDL reductions in Gillie Creek.

DEQ requested an extension for the submittal of the "Bacterial Total Maximum Daily Load Development for the James River and Tributaries – City of Richmond" in order to continue negotiations with the City of Richmond. EPA granted this extension and issued a new deadline of October 1, 2010. After several meetings and coordination with the City of Richmond, DEQ revised the draft TMDL and held a final set of public meetings and comment period in June 2010.

The City of Richmond formally requested permission as an aggrieved party to conduct a UAA for Gillie Creek mid-summer 2010; on the basis that the primary contact recreation use is not an existing use in Gillie Creek and that attainment of the primary contact recreation use is not attainable due to flow conditions, hydrologic modifications, and that the reductions required in the Gillie Creek TMDL would result in substantial and widespread economical and social impacts.

The VA DEQ approach for remediation of impaired waterways consists of the completion and approval of a TMDL study, followed by Implementation Planning, and continued implementation. Only after Implementation is complete or near completion, would the Agency consider development of a Use Attainability Analysis should a waterway be unable to meet the impaired water quality standard. The City of Richmond requests the UAA be completed concurrently with Implementation Planning.

TMDL Summary: Elevated levels of E.coli bacteria showed that these James River stream segments do not support the primary contact water quality standards. The "Bacterial Total Maximum Daily Load Development for the James River and Tributaries – City of Richmond" study area combines rural residential and urban land uses, with potential bacteria sources from pets, livestock, wildlife, and humans

Nonpoint sources include: wildlife, grazing livestock, land application of manure and biosolids, urban/residential runoff, failed and malfunctioning septic systems, illicit cross-connections of residential wastes to the stormwater collection system, leaking sewer lines, and uncontrolled discharges (straight pipes), and non-permitted sewer overflows.

Permitted sources include: permitted waste treatment facilities, domestic waste treatment systems, and combined sewer overflows (CSOs). There are currently 11 active permitted point sources in the watershed permitted for bacterial discharge. In addition, there are 13 single-family general wastewater permits in the watershed. Urban portions of the City of Richmond, Henrico County, and Chesterfield County have MS4 permits.

The City of Richmond has developed, and is currently implementing a Long Term Control Plan (LTCP) to address CSO issues. The LTCP includes the goal of implementing Alternative E, which consists of increased storage capacity, outfall controls, outfall separations, and increased storage and treatment capacity at the Richmond Wastewater Treatment Plant. The majority of scheduled upgrades for the upstream portions along the James River have been completed. Many improvements are scheduled for completion on CSOs which flow into the tidal James River, Gillie Creek, and Almond Creek. Not all of the CSOs in Gillie Creek are addressed under Alternative E. of the LTCP.

Two separate models were required as the system contains tidal and non-tidal segments: The US Geological Survey (USGS) Hydrologic Simulation Program – Fortran (HSPF) water quality model was used to model the riverine non-tidal segments and the CE-QUAL-W2 (Army Corp of Engineers) model was used to develop the tidal portion of the study.

The source loads within the impaired watersheds were evaluated to identify which source reductions yielded the most efficient and achievable reductions to meet compliance with the primary contact standard. Several scenarios are presented for each impaired segment. Virginia's *E. coli* standard does not permit any exceedances of the geometric mean standard, therefore, the final TMDL scenarios (and the resulting reductions necessary) presented for each Creek are based on a zero exceedance rate. Given the challenges of meeting attainment in Gillie Creek and the City's opposition to the TMDL reductions in the model, DEQ scrutinized several additional options in addition to the typical reduction paths seen in scenario tables. The complete evaluation of these and additional scenarios done for Gillie Creek watershed, as well as the final load allocation scenarios for all other impairments in the James River – City of Richmond TMDL watershed are available in the TMDL document.

A TMDL Implementation Plan will be developed that addresses the minimum requirements specified in the Code of Virginia, Section 62.1-44.19:7. Map Tech Inc. (contractor for the "Bacterial Total Maximum Daily Load Development for the James River and Tributaries – City of Richmond") has been engaged to develop the Implementation Plan. Following approval by the SWCB and EPA, VA DEQ will work with watershed stakeholders to create a blueprint to restore impaired waters and enhance the value of their land and water resources. Additional monitoring data to include improvements in water quality in the upper James River delisted portions, citizen monitoring data for the Reedy Creek watershed which indicate bacteria hotspots, and data from the DEQ special monitoring study to evaluate Gillie Creek's localized affect on the water quality in the James River (above Rocketts Landing) will be included in the implementation plan modeling. Gillie Creek and Almond Creek are unique in that even with the bacteria reductions expected with the implementation of the City's Alternative E (LTCP); these impaired segments would not meet the primary contact recreational use standard in modeled scenarios. The TMDL IP will evaluate additional data and identify paths forward, which may include scenarios involving alternative green infrastructure options as well as additional CSO controls in Gillie Creek and Almond Creek watershed.

Public Participation: This TMDL Report was subject to the TMDL public participation process contained in DEQ's Public Participation Procedures for Water Quality Management Planning that the Board approved in March 2004. The TMDL public participation process provides the

affected stakeholders and numerous opportunities to participate and provide input to the development of the TMDL allocations and the report.

Public participation began in June 2006 when DEQ held the first Technical Advisory Committee (TAC) meeting. DEQ held the first public meeting in August 2006. The TAC met again in March 2007. Two public meetings were held in March 2009 and included a public comment period. After a document revision, an additional public comment period was held in December 2009. Two final public meetings were held for the draft TMDL in June 2010 and were also accompanied by a 30-day public comment period. Numerous conference calls were held between DEQ and the City of Richmond throughout the TMDL development.

Public comments received and our responses are included in the Board Book.

Summary of Issues and Concerns: VA-DEQ received comments from 14 different agencies/organizations/citizens from 3 jurisdictions. A number of issues and concerns were expressed by the regulated community which discharge into these waterways and by citizens that recreate in and below the impaired segments. Four major themes pertinent to the stakeholder's comments were identified. A summary of these themes are as follows:

A. Presence of Primary Contact Use of Gillie Creek

Comment:

The City of Richmond has submitted comments at each public comment opportunity stating that Gillie Creek does not support primary contact recreational use.

Response:

As stated in Virginia Water Quality Standards 9 VAC 25-260-10 (Designation of uses),

“All state waters, including wetlands, are designated for the following uses: recreational uses, e.g. swimming and boating;....”

And,

“At a minimum, uses are deemed attainable if they can be achieved by the imposition of effluent limits required under 301(b) and 306 of the Clean Water Act and cost-effective and reasonable best management practices for nonpoint source control.”

B. Gillie Creek Bacteria Localized Impacts on James River High Recreational Use Area of Rocketts Landing and Ancarrow's Public Access Area

Comment:

The City of Richmond may request UAA development for Gillie Creek including the downstream portion of the James . Other commentors demand that the City of Richmond not be allowed to preempt the TMDL process by a premature UAA; the loadings from Gillie Creek impact the recreational downstream segment of the James River.

Response:

Gillie Creek flows into the James River less than a half mile upstream of a highly used recreational area. Rocketts Landing and its private marina lie on the north bank and the Ancarrow's Landing public access area lies on the south bank of the James River just below the outlet of Gillie Creek. In order to remove a designated use, it must be demonstrated that the use is not an existing use, downstream uses are protected, and attaining the use is not feasible as described in 9 VAC 25-260-10.

Modeling of the tidal portion of the James River showed that attainment of the primary contact standard was not impacted by bacteria flowing in from Gillie Creek. However, the modeling outlet where these results were derived is approximately one mile downstream from the confluence of Gillie Creek with the tidal James River (above Rocketts Landing). This modeling identified the extent of the exiting bacterial plume during a rain event on Gillie Creek. The modeling suggested that bacterial plumes from Gillie Creek would not extend across the river to Ancarrow's Landing.

Regional DEQ staff designed a study to monitor the localized effects of a potential Gillie Creek bacterial plume which may impact the local water quality of the tidal James River (above Rocketts Landing). Regional DEQ staff will continue this monitoring in order to evaluate the results as part of the Implementation Planning phase

C. Lack of Alternative Stormwater Scenarios for Gillie Creek

Comment:

VA-DEQ has received comments from citizens requesting that the TMDL, Implementation Planning, and Implementation be completed for Gillie Creek. These comments also highlight the issue that stormwater, which is responsible for the CSO issues on Gillie Creek, has not been remediated which could reduce the number of overflows on the Creek. Citizens have commented that stormwater and MS4 requirements associated with the Chesapeake Bay TMDL, green infrastructure – such as those being developed in Philadelphia, Baltimore, and Washington D.C., as well as the City of Richmond's new Stormwater Utility have the potential to improve the water quality on Gillie Creek and should be completed prior to a Use-Attainability Analysis being developed.

Response:

DEQ, its contractor, and with the input of stakeholders, through the Implementation Planning process, will identify these and other means of stormwater BMPs which will be beneficial to the Gillie Creek watershed and identify whether these additional scenarios may lessen the burden of stormwater bacteria loading on this and other Creeks.

D. Substantial and Widespread Economic Impacts

Comment:

The City of Richmond states that in order to meet the final TMDL scenario on Gillie Creek, a 29.2 million gallon storage facility would be required to capture the 95% overflow volume at a cost of \$300 million dollars.

Staff Comment: EPA may assume responsibility for the completion of this TMDL project if DEQ fails to submit to EPA on or before October 1, 2010.

Development of Virginia's FY 2011 Clean Water Revolving Loan Funding List: Title VI of the Clean Water Act requires the yearly submission of a Project Priority List and an Intended Use Plan in conjunction with Virginia's Clean Water Revolving Loan Fund (VCWRLF) Federal Capitalization Grant application. Section 62.1-229 of Chapter 22, Code of Virginia, authorizes the Board to establish to whom loans are made, loan amounts, and repayment terms. In order to begin the process, the Board needs to consider its FY 2011 loan requests, tentatively adopt a FY 2011 Project Priority List based on anticipated funding, and authorize the staff to receive public comments. On June 2, 2010 the staff solicited applications from the Commonwealth's localities and wastewater authorities as well as potential land conservation applicants and Brownfield remediation clientele. July 16, 2010 was established as the deadline for receiving applications. Based on this solicitation, DEQ received thirty-three (33) wastewater improvement applications requesting \$172,768,329 and two (2) land conservation applications for an additional

\$10,660,000. The federal appropriation for the nation's Clean Water State Revolving Funds for FY 2011 has not been approved yet but Virginia's share is expected to be in the range of \$40 million. This is similar to the amount received in 2010 and represents a significant increase over prior year federal appropriations. State matching funds, along with the accumulation of monies through loan repayments, interest earnings, and de-allocations from leverage accounts should make an additional \$60+ million available for funding new projects. These funds will result in over \$100 million becoming available during the FY 2011 funding cycle. Based on the large amount of applications received relative to available resources, it will be necessary to leverage the Fund again this year. Through leveraging, available cash is placed in a debt service reserve account, and is leveraged on the bond market to create additional funds for projects. In anticipation of the continued high demand for VCWRLF funding, we have met many times with the Virginia Resources Authority and their financial advisors regarding the funding capacity of the program and the ability of the Fund to meet this anticipated demand. From these detailed discussions, a capacity model of the Fund was developed and has been updated and evaluated each year based on market conditions. Recent results of this analysis indicate that, through the continued use of leveraging, the VCWRLF could provide funding in the range of \$175 million this year and still be sustainable to meet anticipated demand into the future. The staff believes it is prudent to move forward with the initial targeting of Virginia's proposed FY 2011 clean water revolving loan funding list for public review based on the anticipated federal appropriation, results of this capacity evaluation, and the maximum utilization of the Fund. Final Board approval of the list will not be requested until the December meeting. All 33 wastewater applications were evaluated in accordance with the program's "Funding Distribution Criteria" and the Board's "Bypass Procedures". In keeping with the program objectives and funding prioritization criteria, the staff reviewed project type and impact on state waters, the locality's compliance history and fiscal stress, and the project's readiness-to-proceed. The two land conservation applications were reviewed using the Board's evaluation criteria and the staff also received input from the Department of Conservation and Recreation in accordance with the Board guidelines and state law. Based on this review and input, the staff believes that both projects would provide for the protection of land that is valuable from a water quality perspective and should be funded. In the interest of assisting the maximum number of applicants with Fund resources, we looked closely at the projects' readiness to proceed to construction. The Tazewell County PSA project is not expected to get underway until 2012 and is therefore being recommended for deferral to resubmit their application during next year's funding solicitation. The recommended funding list shown below provides funding for all the applications that are eligible and ready to proceed at their requested amounts. It is based on the best information and assumptions currently available to staff from the applications received, federal budget negotiations, and discussions between DEQ and the Virginia Resources Authority. A couple of activities will be occurring over the next few months to help clarify these factors including the following: (1) DEQ will hold individual meetings with targeted recipients to verify the information in the applications, especially schedules; and (2) finalization of the federal budget for 2011 will determine the federal appropriation for the Clean Water SRF. The staff is recommending that the list be tentatively adopted, subject to the verification of information in the loan applications (especially schedules) and the availability of funds from the federal appropriations and the 2011 leverage. The final list will be brought back to the Board in December. The VCWRLF program solicited applications for FY 2011 funding assistance and evaluated 35 requests totaling \$183,428,329. After a preliminary evaluation of funding availability, priority consideration, review of anticipated construction schedules, and projected cash flow needs, Virginia's FY 2011 Project Priority List includes 34 projects totaling

\$173,183,129. Based on current and projected cash resources, and considering the additional funds that can be made available through leveraging, the Board should have sufficient funds available to honor these requests at the amounts shown through a leveraged loan program. The staff recommends that the Board target the following localities and organizations for loan assistance, subject to the verification of the information in the loan applications (especially schedules) and the availability of funds, and authorize the staff to present the Board's proposed FY 2011 loan funding list for public comment.

1	Rivanna Water & Sewer Auth.	5,200,000
2	City of Lynchburg	10,100,000
3	Upper Occoquan Service Auth.	20,624,210
4	Alexandria Sanitation Authority	4,900,000
5	City of Covington	5,733,300
6	City of Norfolk	9,300,000
7	Craig-New Castle PSA	365,200
8	Rivanna Water & Sewer Auth.	4,048,000
9	Rivanna Water & Sewer Auth.	6,900,000
10	City of Charlottesville	3,647,680
11	Western VA Water Authority	12,602,500
12	Western VA Water Authority	1,500,000
13	Western VA Water Authority	4,375,000
14	Western VA Water Authority	6,872,000
15	Town of Crewe	6,794,399
16	Northampton County	10,920,746
17	Augusta County	2,562,400
18	Wythe County	1,742,000
19	City of Lynchburg	9,000,000
20	Washington County Service Auth.	1,604,126
21	Washington County Service Auth.	1,793,607
22	Washington County Service Auth.	1,024,613
23	Scott County PSA	590,361
24	Town of Pulaski	1,284,290
25	Coeburn Norton Wise RWTa	11,225,575
26	Town of Abingdon	2,124,000
27	City of Danville	2,000,000
28	Shenandoah County	2,095,642
29	Upper Occoquan Service Auth.	1,876,150
30	HRSD	4,518,000
31	Upper Occoquan Service Auth.	2,499,330
32	Botetourt County	2,700,000
33	Trust for Public Land	8,000,000
34	The Nature Conservancy	2,660,000
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		\$173,183,129